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DOCKET NO. L-00000A-06-0295-00130

BEFORE THE ARIZONA CORPORATION COMMISSION

COMMISSIONERS

MIKE GLEASON, Chairman
WILLIAM A. MUNDELL
JEFF HATCH-MILLER
KRISTIN K. MAYES
GARY PIERCE

Arizona Corporation Commission
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IN THE MATTER OF THE APPLICATION OF SOUTHERN CALIFORNIA EDISON COMPANY AND ITS ASSIGNEES IN CONFORMANCE WITH THE REQUIREMENTS OF ARIZONA REVISED STATUTES SECTIONS 40-360.03 AND 40-360.06 FOR A CERTIFICATE OF ENVIRONMENTAL COMPATIBILITY AUTHORIZING CONSTRUCTION OF A 500 kV ALTERNATING CURRENT TRANSMISSION LINE AND RELATED FACILITIES IN MARICOPA AND LA PAZ COUNTIES IN ARIZONA ORIGINATING AT THE HARQUAHALA GENERATING STATION WEST OF PHOENIX, ARIZONA AND TERMINATING AT THE DEVERS SUBSTATION IN RIVERSIDE COUNTY, CALIFORNIA.	CASE NO. 130 DOCKET NO. L-00000A-06-0295-00130 **DECISION NO. 69638** **ORDER DENYING CEC**

The Arizona Corporation Commission ("Commission") has conducted its review, pursuant to A.R.S. § 40-360.07. Pursuant to A.R.S. § 40-360.07(B), the Commission, in compliance with A.R.S. § 40-360.06 and in balancing the broad public interest, the need for an adequate, economical and reliable supply of electric power with the desire to minimize the effect thereof on the environment and ecology of this state, finds that the above-captioned Application for a Certificate of Environmental Compatibility ("CEC")for siting approval is hereby denied.

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Discussion

Standard for Review

In determining whether to approve a new Certificate of Environmental Compatibility ("CEC"), the Commission is guided by A.R.S. § 40-360.06 and A.R.S. § 40-360.07(B). Together, these statutes require the Commission to determine the environmental impact and need for new transmission lines. Specifically, A.R.S. § 40-360.07(B) states that "In arriving at its decision, the commission shall comply with the provisions of A.R.S. § 40-360.06 and shall balance in the broad public interest, the need for an adequate, economical and reliable supply of electric power with the desire to minimize the effect thereof on the environment and ecology of the state."

The Commission finds that the Devers-Palo Verde 2 ("DPV2") power line, as proposed by Southern California Edison ("SCE") fails to meet the need standard as delineated in A.R.S. § 40-360-07(B). The Commission also finds under A.R.S. § 40-360.06, that DPV2 would have negative impacts on the environment, especially in and around the Kofa National Wildlife Refuge ("Kofa").

Falling short of the requirements of both A.R.S. § 40-360.06 and A.R.S. § 40-360-07(B), the Commission finds that the CEC, as issued by the Power Plant and Line Siting Committee ("Committee") should be denied for the following reasons.

Adequacy

The Commission finds that the record does not demonstrate that DPV2 is necessary to meet the resource adequacy requirements of Arizona utilities. In fact, it is evident that the line would actually impair Arizona's ability to provide for its growing energy demands. The record indicates that Arizona utilities will need to access the excess capacity at the Palo Verde Hub by 2010. If this is the case, it would appear that the construction of DPV2 would place Arizona utilities in the position of having to build additional generation and transmission to fill the gap created by the exportation of power from Arizona to California across DPV2. What is more, SCE believes that additional generation will have to be built in Arizona simply to allow it to take full advantage of DPV2, meaning that not only would currently existing Arizona power resources be conscripted for use in California, but that Arizona would be forced to become host to new power plants designed purely for

use by California consumers. This would represent an unnecessary usurpation of Arizona's land, water and air shed.

While it is obvious that the line is not needed for Arizona's resource adequacy, it is not even clear that DPV2 is required by California. The power that would flow across DPV2 represents a small portion of SCE's total electricity requirements and the record reflects that the Company has a number of other resource options at its disposal, including the construction of additional indigenous natural gas-fired generation and the harnessing of California's numerous renewable resources.

For these reasons, the Commission finds that DPV2 does not meet the adequacy prong of the three-part test for the Commission to determine the need for the project.

Economical

The record is clear, and no party appears to dispute, that the primary beneficiaries of DPV2 would be California ratepayers. If approved, California Independent System Operator ("CAISO") ratepayers would incur $650 million in costs associated with the proposed line, but would reap $1.1 billion in savings. By contrast, this project would result in rate increases for Arizona consumers. Specifically, the evidence indicates that the proposed line would drive up spot market prices at the Palo Verde Hub of $2.90 per MWh, or 5 % over current spot market prices, which would inevitably result in higher power rates paid by Arizonans. The evidence presented by Staff demonstrates that Arizona ratepayers would suffer a net economic loss of $242 million over the life of the line. SCE has made assertions in the record that it will generally not seek to purchase power at the Palo Verde Hub during the summer months, when the power needs for Arizonans are at their apex. However the Company made no assurances that it will not make such purchases. Instead, an SCE exhibit demonstrates that there could be times during the summer that SCE would have an economic interest in buying power at the Palo Verde Hub, further enhancing our concerns that this power line will redound to the detriment of Arizona ratepayers.

While SCE presented evidence showing net benefits of $213 million to Arizona ratepayers, these benefits were calculated utilizing construction jobs which may or may not be located in Arizona; increased access to renewable energy which will likely be monopolized by California due to its own aggressive renewable portfolio requirements; amorphous and loosely defined efficiencies

resulting from an improved investment climate; and synergies with TransWest Express, a power line advocated by Arizona Public Service Company that is still in the rudimentary planning stages. Staff testimony argued that these benefits are hypothetical, and further pointed out that any benefits that might accrue from many of these ancillary effects of the power line are unrelated to anything contained in A.R.S. § 40-360.07(B). The Commission agrees that these benefits are highly speculative and not relevant to the prescriptions of A.R.S. § 40-360.07(B), and therefore finds that Applicants have failed to prove the existence of an economic need for this project.

Reliability

SCE argues that the proposed line will improve reliability for both Arizona and the West and points to statements by the Western Governors Association in favor of transmission lines that will bolster the soundness of the Western grid. Arizona has done much to advance these goals by approving hundreds of miles of new transmission lines in recent years. Additionally, the Arizona Corporation Commission's Staff has taken a lead role in advocating for more advanced reliability measures than many other Western states currently employ. Specifically, Staff objects to DPV2's use of special protection schemes, ("SPS") or remedial action schemes ("RAS"). According to Staff, these protective schemes are ill-advised for long-term application and the Commission has rejected their use for new installations in Arizona, believing that to utilize such schemes would compromise rather than enhance reliability. Further, SCE's proposal would have allowed the expansion of CAISO's control area into Arizona, limiting Arizona's ability to determine FERC tariffs related to the line inside Arizona borders. To remedy its concerns over this loss of sovereignty, Staff offered Condition 6(b), which was rejected by the Committee.

Additionally, with improved capacitors on the California side of the line, SCE could potentially import up to 1800 MW of power across DPV2, up from the line's current 1200 MW rated capacity. The additional 600 MW that could potentially be transported to California would further strain the Arizona grid and hamper the state's ability to provide energy and power reserves to Arizona ratepayers.

The Commission concurs with Staff that DPV2 "adds new reliability risks and consequences" and does not meet Arizona's reliability standards. If constructed, the line will not improve the

reliability of Arizona's electric grid. Rather, the Commission finds that the line could actually spell a step backward from Arizona's practice of implementing reliability protections that exceed industry, regional and national norms.

SCE argued that Arizona law allows the Commission to take into consideration the needs of other states when deciding whether to approve a CEC. *Grand Canyon Trust v. A.C.C.,* 210 Ariz. 20 (App. 2005). Even when the needs of other states are taken into account along with Arizona's needs, when the Commission performs the balancing in the broad public interest, referred to in A.R.S. § 40-360.07, the Commission finds that the project's negative effect on the environment and ecology of Arizona outweighs any need for adequate, economical and reliable supply of electric power the project could provide for this state as well as other states.

Because the Applicant has failed to demonstrate that there is a need for an adequate, economical and reliable supply of electric power associated with DPV2, the Commission finds that when it balances in the broad public interest the negative effect of the project on the environment and ecology of the state, the proposed line has failed to meet the test under A.R.S. § 40-360.07(B).

Environment

Approximately 24 miles of DPV2 would pass through the Kofa National Wildlife Refuge. The record in this case indicates that Kofa is one of only 535 such areas in the United States, one of only 9 of its kind in Arizona, contains over 665,000 acres, and is a primary habitat for bighorn sheep. The evidence shows that the negative environmental impacts associated with constructing a power line that further partitions Kofa include a diminishment of the visual aesthetics of Kofa, damage to recreational opportunities valued by numerous Arizonans, and deleterious and irreparable impacts to wildlife in the area. These detriments clearly outweigh the purely speculative benefits the Applicants have argued might one day be associated with DPV2 and therefore Applicants have failed to meet the requirements of A.R.S. § 40-360.06.

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Findings of Fact

1. The Applicant purports the Project will enhance resource adequacy for Arizona and Arizona ratepayers.

2. The evidentiary record indicates that the need for the Project is less compelling for Arizona and Arizona ratepayers than for California and CAISO ratepayers.

3. The Applicant's plan to absorb Arizona's excess generating capacity will force the installation of new generation in Arizona sooner.

4. Staff testified that Arizona electric utilities will not own enough generating capacity to meet all their loads in 2010 and therefore will have to rely on merchant power plants, particularly at those located at the Palo Verde Hub.

5. The Commission finds the Project will not improve the resource adequacy for Arizona and Arizona ratepayers and could have a deleterious effect on it in subsequent years.

6. The Applicant purports that Arizona and Arizona ratepayers will receive considerable economic benefits from the Project.

7. The evidentiary record indicates that the Project is designed to meet the economic needs of California and CAISO ratepayers, not the needs of Arizona and Arizona ratepayers.

8. The economic benefits to California and CAISO ratepayers have been quantified and documented by the Applicant.

9. The economic benefits espoused by the Applicant to Arizona and Arizona ratepayers can be characterized as temporary, indirect, illusory or speculative.

10. The economic costs to Arizona and Arizona ratepayers have been quantified and documented by the Applicant.

11. Staff testified that spot wholesale prices at the Palo Verde Hub are estimated to increase by at least 5% if the Project was approved and constructed.

12. Staff testified that Arizona ratepayers would suffer a net economic loss of $242 million over the life of the line.

13. The Commission finds that the economic benefits accrue predominantly to California and CAISO ratepayers, while economic costs accrue predominantly to Arizona and Arizona ratepayers.

14. The Applicant purports that the Project will strengthen the Southwestern transmission grid because congestion would be reduced on Path 49 between Arizona and California.

15. Staff contends that the Applicant's proposed special protection schemes or remedial action schemes for the Project could actually weaken the reliability of the grid.

16. The Commission has the authority to establish reliability standards higher than the minimum requirements established by regional and national reliability organizations.

17. The conditions originally proposed by Staff were intended to create sufficient reliability benefits for Arizona and Arizona ratepayers.

18. The Siting Committee did not adopt Staff's conditions as proposed, which would have provided sufficient reliability benefits to offset partially the lack of economic benefits for Arizona and Arizona ratepayers.

19. The Commission finds that even if the Siting Committee adopted Staff's conditions as proposed, the economic costs to Arizona and Arizona ratepayers simply outweigh the modest transmission and commercial enhancements to the Western Grid that are derived from the Project.

20. The Commission finds that the record in this case shows that the negative

environmental impacts associated with constructing a power line that further partitions Kofa include a diminishment of the visual aesthetics of Kofa, damage to recreational opportunities valued by numerous Arizonans, and deleterious and irreparable impacts to wildlife in the area.

Further Findings Of Fact And Conclusions Of Law

The Commission further finds and concludes that in balancing the broad public interest under A.R.S. § 40-360.07(B) in this matter as follows.

21. The evidence in the record is not sufficient to weigh the balancing of the public interest in favor of granting a CEC in this matter when all the factors set forth in A.R.S. § 40-360.06 are considered along with need for an adequate economical, and reliable supply of electric power;

22. The conditions placed upon CEC by the Arizona Power Plant and Transmission Line Siting Committee ("Siting Committee") are not sufficient to weigh the balancing of the public interest in favor of granting a CEC in this matter when all the factors set forth in A.R.S. § 40-360.06 are considered along with the need for an adequate, economical, and reliable supply of electric power;

23. The record compels balancing the competing public interests in favor of protection of the environment and ecology of the State of Arizona by denying Applicant a Certificate of Environmental Compatibility;

24. The CEC issued by the Siting Committee should not be confirmed and approved by the Commission; and

25. The Commission's Findings 1 through 24 herein, as well as the findings addressed in the Commission's Discussion above, serve as the Commission's Findings of Fact and Conclusions of Law in reaching its decision.

THEREFORE, THE COMMISSION FURTHER FINDS AND CONCLUDES that the CEC issued by the Siting Committee is hereby denied by this Order; and, the above-captioned Application for a CEC is hereby denied by this Order.

THE ABOVE CAPTIONED APPLICATION FOR A CEC IS DENIED, AND, THE CEC ISSUED BY THE SITING COMMITTEE IS INCORPORATED HEREIN AND IS DENIED BY ORDER OF THE ARIZONA CORPORATION COMMISSION

CHAIRMAN | COMMISSIONER

COMMISSIONER | COMMISSIONER | COMMISSIONER

IN WITNESS WHEREOF, I BRIAN C. MCNEIL, Executive Director of the Arizona Corporation Commission, have hereunto, set my hand and caused the official seal of this Commission to be affixed at the Capitol, in the City of Phoenix, this 6th day of June, 2007.

BRIAN C. MCNEIL
Executive Director

BEFORE THE ARIZONA POWER PLANT AND

TRANSMISSION LINE SITING COMMITTEE

IN THE MATTER OF THE APPLICATION OF SOUTHERN CALIFORNIA EDISON COMPANY AND ITS ASSIGNEES IN CONFORMANCE WITH THE REQUIREMENTS OF ARIZONA REVISED STATUTES SECTIONS 40-360.03 AND 40-360.06 FOR A CERTIFICATE OF ENVIRONMENTAL COMPATIBILITY AUTHORIZING CONSTRUCTION OF A 500kV ALTERNATING CURRENT TRANSMISSION LINE AND RELATED FACILITIES IN MARICOPA AND LA PAZ COUNTIES IN ARIZONA ORIGINATING AT THE HARQUAHALA GENERATING STATION WEST OF PHOENIX, ARIZONA AND TERMINATING AT THE DEVERS SUBSTATION IN RIVERSIDE COUNTY, CALIFORNIA	Docket No. L-00000A-06-0295-00130 Case No. 130

CERTIFICATE OF ENVIRONMENTAL COMPATIBILITY

Pursuant to notice given as provided by law, the Arizona Power Plant and Transmission Line Siting Committee (the "Committee") held public hearings on June 26 and 27, August 21 and 22, September 11, 12, 25 and 26, and October 3, 4, 16, 17, 30 and 31, 2006, and, February 28, 2007, all in conformance with the requirements of A.R.S. § 40-360, *et seq.,* for the purpose of receiving evidence and deliberating on the Application of Southern California Edison Company (the "Applicant") for a Certificate of Environmental Compatibility (the "Certificate") in the above-captioned case (the "Project").

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The following members and designees of members of the Committee were present at one or more of the hearings for the evidentiary presentations and/or for the deliberations:

Laurie Woodall	Chairman, Designee for Arizona Attorney General Terry Goddard
David L. Eberhart, P.E.	Designee for Chairman, Arizona Corporation Commission ("ACC" or "Commission")
Ed Ranger	Designee for Director, Arizona Department of Environmental Quality ("ADEQ")
Jim Arwood	Director, Energy Office, Arizona Department of Commerce ("Energy Office")
Gregg Houtz	Designee for Director, Arizona Department of Water Resources
Jeff McGuire	Appointed Member
Michael Palmer	Appointed Member
Joy Rich	Appointed Member
A. Wayne Smith	Appointed Member
Margaret Trujillo	Appointed Member (until January 2007)
Michael Whalen	Appointed Member
Barry Wong	Appointed Member (from January 2007)

The Applicant was represented by Thomas H. Campbell and Albert H. Acken of Lewis and Roca LLP and Michael D. Mackness of the Southern California Edison Company Law Department. The following parties were granted intervention pursuant to A.R.S. § 40-360.05: ACC Staff ("Staff"), represented by Christopher Kempley and Keith Layton; the Sierra Club, Grand Canyon Chapter, represented by Timothy Hogan;

Harquahala Valley Irrigation District, represented by William D. Baker; Walter Meek, Pro Se; the Residential Utility Consumer Office ("RUCO"), represented by Scott Wakefield; Donald G. Begalke, Pro Se; Central Arizona Water Conservation District ("CAWCD"), represented by Thomas W. McCann; Harquahala Valley Power District, represented by Jay I. Moyes and Steve Wene of Moyes Storey, Ltd.; Gila River Power LP, represented by Patrick Black of Fennemore Craig P.C.; Tucson Electric Power Co., represented by Michael W. Patten, J. Matthew Derstine and Laura Sixkiller of Roshka DeWulf & Patten, PLC; Langley Properties, LLC, represented by Court S. Rich of Rose Law Group PC; and Mohave Electric Cooperative, Inc., represented by Michael A. Curtis, Larry K. Udall and William P. Sullivan of Curtis, Goodwin, Sullivan, Udall & Schwab, P.L.C.

At the conclusion of the hearings, the Committee, having received the Application, the appearances of the parties, the evidence, testimony and exhibits presented at the hearings, and being advised of the legal requirements of A.R.S. §§ 40-360 to 40-360.13 and the holding in *Grand Canyon Trust v. Arizona Corporation Commission*, 210 Ariz. 30, 38, 107 P.3d. 356 (App. 2005), found that the Project is environmentally compatible, and upon motion duly made and seconded, voted (eight in favor, three opposed) to grant the Applicant a Certificate of Environmental Compatibility (Case No. 130) for authority to construct the following facilities as requested in the Application: a 500kV alternating current transmission line and related facilities in Maricopa and La Paz counties in Arizona originating west of Phoenix, Arizona, at the new Harquahala Junction Switchyard (Case No. 128), and terminating at the Devers Substation in Riverside County, California, as indicated below and depicted in Exhibit A. The Project consists of approximately 97 miles of 500kV transmission line in Arizona.

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PROPOSED ROUTE

The Arizona portion of the Project originates at a new Harquahala Junction Switchyard (certificated in ACC Decision no. 68063) to be located in the southwest quarter of Section 25, Township 2 North, Range 8 West. The entire Project will be located within a nominal 130-foot-wide right-of-way on federal land and state land and a nominal 160-foot wide right-of-way on private land adjacent to the existing Devers to Palo Verde No. 1 ("DPV1") 500kV transmission line (Case Nos. 34 and 48) right-of-way. The Project right-of-way will be to the west and south of the DPV1 right-of-way east of Copper Bottom Pass (located in La Paz County, Section 20, Township 3 North, Range 20 West), and on the east and north side of the DPV1 right-of-way between the western end of Copper Bottom Pass (Section 14, Township 3 North, Range 21 West) and the Colorado River. The majority of the proposed route is located within a utility corridor designated by the Bureau of Land Management ("BLM").

From the Harquahala Junction Switchyard, the route will head north and parallel DPV1 for approximately 2.7 miles to Interstate 10 ("I-10"), where it will cross I-10 and proceed to a point one mile northwest of Burnt Mountain.

The route will then turn west and generally parallel the I-10 and Central Arizona Project ("CAP") Canal for approximately 20 miles through the Big Horn Mountains and across the Harquahala Plain to a point 0.5 mile north of I-10. From that point, the route will then turn southwest, crossing I-10, and proceed approximately five miles to intersect the El Paso Natural Gas Company's existing pipeline just north of its Wenden Pump Station north of the Eagletail Mountains.

The route will then roughly parallel the El Paso Natural Gas pipeline and parallel the DPV1 line for approximately 56 miles, crossing the Ranegras Plain, through approximately 25 miles of the Kofa National Wildlife Refuge (beginning at the east

boundary in Section 13, T2N R15W, and ending at the west boundary in Section 7, T2N R18W), crossing the La Posa Plain and Arizona State Highway 95, and through the Dome Rock Mountains to the summit of Copper Bottom Pass. The route will include the existing double-circuit transmission towers located along a three-mile segment in the Copper Bottom Pass.

The route will then turn southwest away from the pipeline, descend the western slope of the Dome Rock Mountains and proceed approximately nine miles to a crossing of the Colorado River in La Paz County (Section 5, Township 2 North, Range 22 West).

The Project will use single-circuit 500kV towers for the DPV2 transmission line route with the exception of 13 existing double-circuit towers located along a segment in the western portion of Copper Bottom pass. The Project also may require the construction of up to two (2) modified single-circuit or double-circuit towers to enter the Harquahala Junction Switchyard. Conceptual drawings of typical structures are attached as Exhibit B. If final dimensions of the towers entering the Harquahala Junction Switchyard differ from the dimensions identified in the application, Applicant shall file the final design of such towers in this docket. Applicant agrees to consult with Staff concerning these tower designs, if Staff requests within 15 days of the filing of the final design.

FINDINGS OF FACT REGARDING THE NEED FOR THE PROJECT

1. The Project will help to reduce congestion on Path 49 between Arizona and California. The need to reduce this congestion has been identified by the U.S. Department of Energy, various regional planning groups, and the Applicant. The regional planning groups and the Applicant have confirmed that the Project will reduce this congestion. Reducing this congestion strengthens the Southwestern transmission grid.

2. The Project will allow underutilized power plants in Arizona to sell additional power, particularly during off-peak seasons and off-peak hours. Currently, while there is excess generation in the Palo Verde area year-round, Arizona utilities believe the current peak excess may be utilized as soon as 2011. However, even at that time, there will continue to be excess merchant and utility generation during the off-peak hours and seasons. The ability to use the excess non-peak capacity may encourage investment in and help defray the costs of new resources that will be needed to meet Arizona's growing peak loads.

3. The Project also may help meet California's need for diverse, cost-effective resources. Particularly in off-peak periods, the Project may allow California access to excess lower cost resources from more efficient plants thereby reducing costs to California consumers and providing a more diverse and environmentally compatible portfolio of energy resources.

4. The Project may enhance grid and resource reliability, especially in emergency situations.

5. The Project may increase power pooling.

6. The Project will result in economic and fiscal benefits from construction and increased state and local taxes in Arizona.

7. The Project will help maintain greater liquidity at the Palo Verde Hub and thereby reduce transaction costs for Arizona utilities.

8. The Project may result in greater fuel and load diversity for Arizona and the Southwest.

9. The Project may improve Arizona generation investment climate thereby reducing the cost of building or procuring the additional generation supply

Arizona will need to serve its growing load.

10. The Project will improve Arizona's resource utilization, including the increased opportunity for Arizona utilities to make off-system sales, so that some of their costs will be paid by California customers.

11. The Project will improve Arizona's and the region's access to renewable resources.

12. The Project complements Arizona interstate transmission projects such as Trans-West Express and Project SunZia.

13. The Project enhances interconnection opportunities at the Harquahala Junction Switchyard.

14. Planned development of Arizona's natural gas transmission and storage facilities will offset an estimated increase in Arizona natural gas usage resulting from increased utilization of generating facilities.

15. The estimated increase in Arizona utilities' production costs reported in the Applicant's report to the California Independent System Operator ("CAISO") is less than 0.2% of the Arizona utilities' annual costs. Moreover, this report is based on assumptions about Arizona utilities buying all energy on the spot market and Arizona requiring that all future generation be built by merchant companies, not Arizona utilities. If these two assumptions are adjusted to comport with Arizona realities, the estimated production cost increases will be smaller.

16. The Project reduces emissions in the Western Electricity Coordinating Council ("WECC") region, including CO_2, a greenhouse gas associated with global warming, because newer, cleaner, and more efficient plants are being utilized more, and older and less efficient plants are used less.

17. In Arizona, it is estimated that the Project will result in increased NOx emissions of 0.05% and increased water usage of 0.02%.

18. The April 2006 "Summer 2006 Electricity Supply and Demand Outlook, Final Staff Report," of the California Energy Commission (CEC-700-2006-005), notes that the only high probability resource additions or retirements in California beyond the summer of 2006 are the new 153 MW Roseville Energy Park, and the Los Angeles Department of Water and Power replacing a 585 MW plant with a new 600 MW combined-cycle plant in 2008.

19. Staff opposes the Application as filed. However, Staff proposed seven conditions to the Certificate that make the project acceptable. Even if the proposed conditions are adopted, Staff does not endorse or recommend the project for approval. Staff simply does not oppose the project.

20. The evidence is insufficient to demonstrate that the Project is the only solution for the problem of resource adequacy in California. The Project is not required to meet the resource adequacy of Arizona ratepayers.

21. The evidence supports a finding of economic benefit to California ratepayers, but does not sufficiently demonstrate Arizona ratepayers have an economic need for the Project.

22. The conditions of this Certificate do not make the Project economically infeasible.

23. The conditions of this Certificate do not reduce the benefits of the Project to relieve congestion in interstate commerce.

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CONDITIONS

This Certificate is granted upon the following conditions:

1. The Applicant shall obtain all required approvals and permits necessary to construct the Project.
2. The Applicant shall comply with all existing applicable air and water pollution control standards and regulations, and with all existing applicable ordinances, master plans and regulations of the State of Arizona, the County of Maricopa, the County of La Paz, the United States of America, and any other governmental entities having jurisdiction.
3. This authorization to construct the Project shall expire five (5) years from the date the Certificate is approved by the ACC unless construction is completed to the point that the Project is capable of operating by that time; provided, however, that prior to such expiration the Applicant or its assignees may request that the Commission extend this time limitation.
4. The Applicant shall make every reasonable effort to identify and correct, on a case-specific basis, all complaints of interference with radio or television signals from operation of the transmission line and related facilities addressed in this Certificate. The Applicant shall maintain written records for a period of five (5) years from the date of any such complaints of radio or television interference attributable to operation, together with the corrective action taken in response to each complaint. All complaints shall be recorded to include notations on the corrective action taken. Complaints not leading to a specific action or for which there was no resolution shall be noted and explained. The record shall be signed by the Applicant and also the complainant, if possible, to indicate concurrence with the corrective

action or agreement with the justification for a lack of action.

5. The Project shall comply with applicable noise guidelines of the U.S. Department of Housing and Urban Development and the U.S. Environmental Protection Agency.

6. Pursuant to A.R.S. §41-844, if any archaeological, paleontological or historical site or object that is at least fifty years old is discovered on state, county or municipal land during plan-related activities, the person in charge shall promptly report the discovery to the Director of the Arizona State Museum, and in consultation with the Director, immediately shall take all reasonable steps to secure and maintain the preservation of the discovery. If human remains and/or funerary objects are encountered during the course of any ground disturbing activities relating to the development of the subject property, Applicant shall cease work on the affected area of the Project and notify the Director of the Arizona State Museum in accordance with A.R.S. § 41-865.

7. Applicant shall consult an archaeologist during construction activities in applicable areas, as determined by the State Historic Preservation Office ("SHPO"), to advise it in connection with any additional archaeological studies that may be required and any mitigation efforts for archaeological sites that may be affected by the construction of the Project.

8. After construction, the Applicant, in conjunction with any applicable land managing agency, shall allow Arizona Site Stewards, a volunteer-staffed SHPO program, periodically, to inspect archaeological sites within the corridor for vandalism or other damage.

9. The Applicant shall follow the Arizona State Land Department's ("ASLD") instructions, if any, regarding the treatment of State Register of Historic Places-eligible properties situated on ASLD land in consultation with SHPO.

10. In consultation with SHPO and the land-managing agency, the Applicant will consider and assess potential direct and indirect impacts to eligible properties related to new access roads or any existing access roads that require blading.

11. Where practicable, the Applicant shall use existing roads for construction and access. The Applicant shall minimize vegetation disturbance outside of the transmission line right-of-way, particularly in drainage channels and along stream banks.

12. The Applicant shall use non-specular conductor and dulled surfaces for transmission line structures.

13. Within 45 days of: a) securing easement or right-of-way for the Project on private property; or b) approval of the Certificate by the Commission, whichever is later, the Applicant shall erect and maintain signs on such private property providing public notice that the property is the site of a future transmission line or switchyard site. Such signage shall be no smaller than a normal roadway sign printed on materials of a color designed to attract attention. The Applicant shall place signs in prominent locations at reasonable intervals such that the public is notified along the full length of the transmission line until the transmission structures are constructed.

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The signs shall advise:

- That the site has been approved for the construction of Project facilities including a 500kV transmission line;
- The expected date of completion of the Project facilities;
- A phone number for public information regarding the Project;
- The name of the Project;
- The name of the Applicant; and
- The Applicant's website.

14. In the event that the Project requires an extension of the term of this Certificate prior to completion of construction, Applicant shall use reasonable means to notify directly all landowners and residents within one-half mile of the Project corridor and one-half mile radius of the Project facilities for which the extension is sought. Such landowners and residents shall be notified of the time and place of the proceeding in which the Commission shall consider such request for extension.

15. Before construction on this Project may commence, the Applicant must file a construction mitigation and reclamation plan (the "Plan") with ACC Docket Control, with copies to affected areas of jurisdiction, Arizona Game and Fish Department ("AGFD"), and to the Sierra Club, Grand Canyon Chapter at the addresses in Condition 16. The Applicant shall, within one (1) year of completion of construction of the Project, re-vegetate any area of native vegetation disturbed by construction of the Project outside of the transmission line right-of-way, except for any road that may be necessary to access the transmission lines or substation sites for maintenance and repair.

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The goals of the Plan will be to:

- Avoid impacts where practical;
- Where impacts are unavoidable, minimize impacts; and
- Focus on site preparation to facilitate natural processes of re-vegetation and drainage.

Other key elements of the Plan, when not inconsistent with the respective land management agencies' or local owners' requirements are to:

- Emphasize final site preparation to encourage natural re-vegetation;
- Avoid (*i.e.,* preserve), where practical, mature native trees;
- Stipulate a maximum construction corridor width;
- Reserve topsoil and native plant materials from right-of-way before grading, and distribute over the right-of-way after construction is complete;
- Imprint the reclaimed right-of-way to provide indentations to catch seed and water;
- Implement best management practices to protect the soil;
- Apply reclamation methods that have been proven effective in the desert environment; and
- Prevent, where applicable, the spread of noxious weeds or other undesirable species.

16. On federal lands, Applicant shall comply with the environmental mitigation measures and other conditions or requirements of the right-of-way grant and Plan of Development on BLM lands, the Kofa National Wildlife

Refuge right-of-way grant, and the U.S. Army Yuma Proving Ground right-of-way grant. Within the Kofa National Wildlife Refuge, the Applicant shall comply with mitigation measures B-1a, B-1b, B-2a, B-2b, B-5a, B-6a, B-7b, B-7c, B-9a, B-9b, B-9c, B-9d, B-9f, B-15a, B-16a, V-1a, V-2a, V-3a, WR-1a, and WR-2a contained in the Final Environmental Impact Report/Environmental Impact Statement (these specified mitigation measures are attached as Exhibit C). In addition, where these mitigation measures require consultation, evaluation, coordination, or notification, Applicant will also consult with the ACC Staff and AGFD. Applicant will include the Sierra Club, Grand Canyon Chapter, in any consultation necessary under Mitigation Measure B-9f; however, approval by the Sierra Club will not be required. Copies of all plans, surveys, and reports identified in these mitigation measures will be provided to: (1) the ACC Staff, by filing with ACC Docket Control, 1200 West Washington Street, Phoenix, Arizona 85007; (2) AGFD, by mailing to Habitat Branch Chief, Arizona Game and Fish Department, 2221 W. Greenway Road, Phoenix, Arizona, 85023; and (3) the Sierra Club, Grand Canyon Chapter, by mailing to Conservation Director, Sierra Club, Grand Canyon Chapter, 202 E. McDowell Road, Suite 277, Phoenix, Arizona, 85004. The submittals required by this condition shall be provided contemporaneously with submittals to BLM, the California Public Utilities Commission ("CPUC"), and the U.S. Fish and Wildlife Service.

17. Applicant shall retain a qualified biologist to monitor all ground clearing/disturbance activities that could affect sensitive species or habitat. The biological monitor will be responsible for ensuring that proper actions are taken if special status species are encountered. Specifically, in areas

considered to comprise suitable Sonoran desert tortoise habitat, Applicant shall conduct preconstruction surveys and/or monitor for desert tortoises. If desert tortoises are encountered during construction, the Applicant shall follow the AGFD's Guidelines for Handling Sonoran Desert Tortoises.

18. Applicant shall retain a qualified professional, knowledgeable regarding Arizona's Native Plant Law (A.R.S. § 3-901, *et seq.*) to salvage mesquite, ironwood, palo verde trees and saguaros removed during project construction activities consistent with Arizona's Native Plant Law and use the vegetation for reclamation in or near its original location.

19. Applicant shall provide copies of this Certificate to La Paz County and Maricopa County planning agencies, the county boards of supervisors, the Arizona Department of Real Estate, SHPO, AGFD and ASLD.

20. Before commencing construction of Project facilities located within 100 feet of any existing natural gas or hazardous liquid pipeline, the Applicant shall:

    (a) perform the appropriate grounding and cathodic protection studies to show that the Project's location within 100 feet of such pipeline results in no material adverse impacts to the natural gas or hazardous liquid pipeline or to public safety when both are in operation. A report of studies shall be provided to the ACC Staff, by filing with ACC Docket Control, 1200 West Washington Street, Phoenix, AZ 85007, as part of Applicant's compliance with the Certificate. If material adverse impacts are noted in the studies, Applicant shall take appropriate steps to ensure that such material adverse impacts are eliminated. Applicant shall provide to the Staff, by filing with ACC Docket Control, written documentation of the actions that will be

taken and documentation showing no material adverse impact will occur; and,

(b) perform a technical study simulating an outage of the facility that may be caused by the collocation of the Project within 100 feet of the existing natural gas or hazardous liquid pipeline. This study should either: i) show that such outage does not result in customer outages; or, ii) include operating plans to minimize any resulting customer outages. Applicant shall provide a copy of this study to ACC Staff, by filing with ACC Docket Control.

21. Prior to the date this transmission line is put into commercial service, Applicant shall provide homebuilders and developers of record of land parcels located within one (1) mile of the center line of the certificated route the identity, location, and a pictorial depiction of the type of power line being constructed, accompanied by a written description, and encourage the developers and homebuilders to include this information in the developers' and homebuilders' homeowners' disclosure statements.

22. Applicant shall publish a copy of this Certificate and the attachments on Applicant's Project website within 10 days of approval of the Commission.

23. Applicant agrees to make good faith efforts for the term of the Certificate, but not less than ten (10) years, to work within California and Federal Energy Regulatory Commission ("FERC") proceedings to encourage regional access to natural gas storage facilities in California in a manner that addresses natural gas service reliability and efficiency in the region, including Arizona.

24. To ensure the Project does not adversely affect the reliability of the Arizona Extra High Voltage ("EHV") grid and power plants interconnected at the Palo Verde Hub, the WECC-rated Path 49 shall not be operated above the level at which a North American Electric Reliability Corporation ("NERC") Category C.5 common mode outage of the two Devers to Palo Verde lines would cause cascading outages. Studies will be performed annually to establish with WECC such a Path 49 Operational Transfer Capability ("OTC") limit for the common mode outage of the two Devers to Palo Verde transmission lines.

25. The Project shall terminate at the new Harquahala Junction Switchyard (Case 128) and the existing Harquahala to Hassayampa 500kV line shall interconnect at the Harquahala Junction Switchyard in order to mitigate prevailing reliability risks associated with extreme contingencies in the vicinity of the Palo Verde Hub. The Harquahala Junction Switchyard is to be jointly owned by the Palo Verde to TS5 participants and Applicant. The Harquahala Junction Switchyard to Hassayampa Switchyard line is to be jointly owned by Applicant and the Palo Verde to TS5 participants.

26. Applicant must, prior to commencing operation, file with FERC a request in conjunction with all interested Palo Verde Hub interconnecting parties, for modification of the transmission tariff-free zone at the Palo Verde Hub to include all transmission lines currently interconnecting power plants to the Palo Verde Switchyard or the Hassayampa Switchyard. Applicant commits to work with APS so that the Harquahala Power Plant can schedule its full capacity from the Harquahala Junction Switchyard to the Hassayampa Switchyard.

27. The Staff maintains that control area authority and associated operational reliability obligations placed by the ACC upon power plants originally interconnected at the Palo Verde Hub are to be maintained with the new interconnection at the Harquahala Junction Switchyard and that such power plant obligations can be transferred to the transmission control area to which they are interconnected in the event that they desire to discontinue as a generator-only control area operator. Applicant will not object to Staff's position in any forum.

28. Applicant shall support an Arizona-based utility having operational control of the Harquahala Junction Switchyard, the Harquahala Junction Switchyard to Hassayampa Switchyard transmission line, and the Harquahala Junction Switchyard termination of the Project and the Harquahala Power Plant line. Applicant shall not have operational control of the above facilities.

29. Applicant may seek approval to change the WECC rating of Path 49 due to changes in the Project after receiving a Certificate. Applicant agrees to seek an amendment pursuant to A.R.S. § 40-252 prior to beginning construction of any facilities or installing any equipment within Arizona necessary to allow and accomplish the operation of the Project at an increased rating.

30. Applicant has an application (Advice Letter 2062-E) pending before the CPUC that requests permission to record and recover the costs of studies to interconnect renewable generation facilities in three areas of potentially significant renewable resources, including western Nevada. Applicant commits to amend Advice Letter 2062-E to include renewable resources

including solar in western Arizona. Subject to receiving regulatory approval of Advice Letter 2062-E, Applicant commits to perform transmission feasibility studies to interconnect renewable resources including solar in western Arizona. Applicant will confer with the Arizona Department of Commerce Energy Office as part of the study process. Copies of Arizona studies will be provided to the Arizona Department of Commerce Energy Office, Suite 600, 1700 W. Washington St., Phoenix, Arizona 85007 and the ACC Staff, by filing with ACC Docket Control, 1200 West Washington St., Phoenix, Arizona 85007. Applicant will coordinate and cooperate with the Arizona utilities in interconnection requests made by renewable generators in Arizona.

31. Applicant shall submit a self-certification letter annually, identifying which conditions contained in the Certificate have been met. Each letter shall be submitted to the ACC Utilities Division Director, by filing with ACC Docket Control, on or before December 1, beginning in 2007. Attached to each certification letter shall be documentation explaining, in detail, how compliance with each condition was achieved. Copies of each letter, along with the corresponding documentation, shall also be submitted to the Line Siting Committee Chair, c/o the Arizona Attorney General, 1275 West Washington Street, Phoenix, AZ 85007, and the Department of Commerce Energy Office.

32. The Applicant agrees to provide to the Air Quality Division, ADEQ, 1110 W. Washington St., Phoenix, AZ 85007, quarterly greenhouse gas emission inventories for power purchased in Arizona, and the Applicant agrees that it will be considered to be a member of the Arizona energy

supply sector for all purposes and subject to the conditions of Arizona's Climate Change Action Plan and the Western Regional Climate Action Initiative.

GRANTED this 21 day of March, 2007.

THE ARIZONA POWER PLANT AND TRANSMISSION LINE SITING COMMITTEE

By: Laurie A Woodall

Laurie A. Woodall, Chairman
Assistant Attorney General

312154 (3/19/07)

Devers - Palo Verde No. 2 Transmission Line Project

EXHIBIT A

Panel 1 of 2

Sources

United States Geological Survey (USGS), hillshade derived from USGS 30-meter Digital Elevation Models.

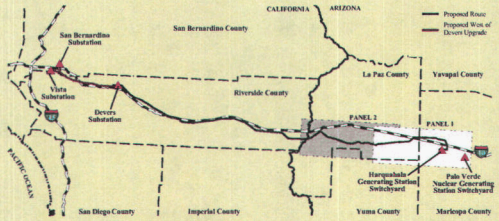
Legend

- Proposed 500kV Transmission Line Route
- Existing 500kV Transmission Line
- Substation/Switchyard

General Reference Features

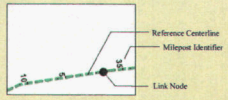
- County Boundary
- Interstate/Highway
- Central Arizona Project Canal
- Natural Gas Pipeline
- Roads
- Township and Range

Panel Index Map



0 1 2 3 4 5 Miles

Line separation is shown for illustrative purposes and is not to scale.



SOUTHERN CALIFORNIA EDISON

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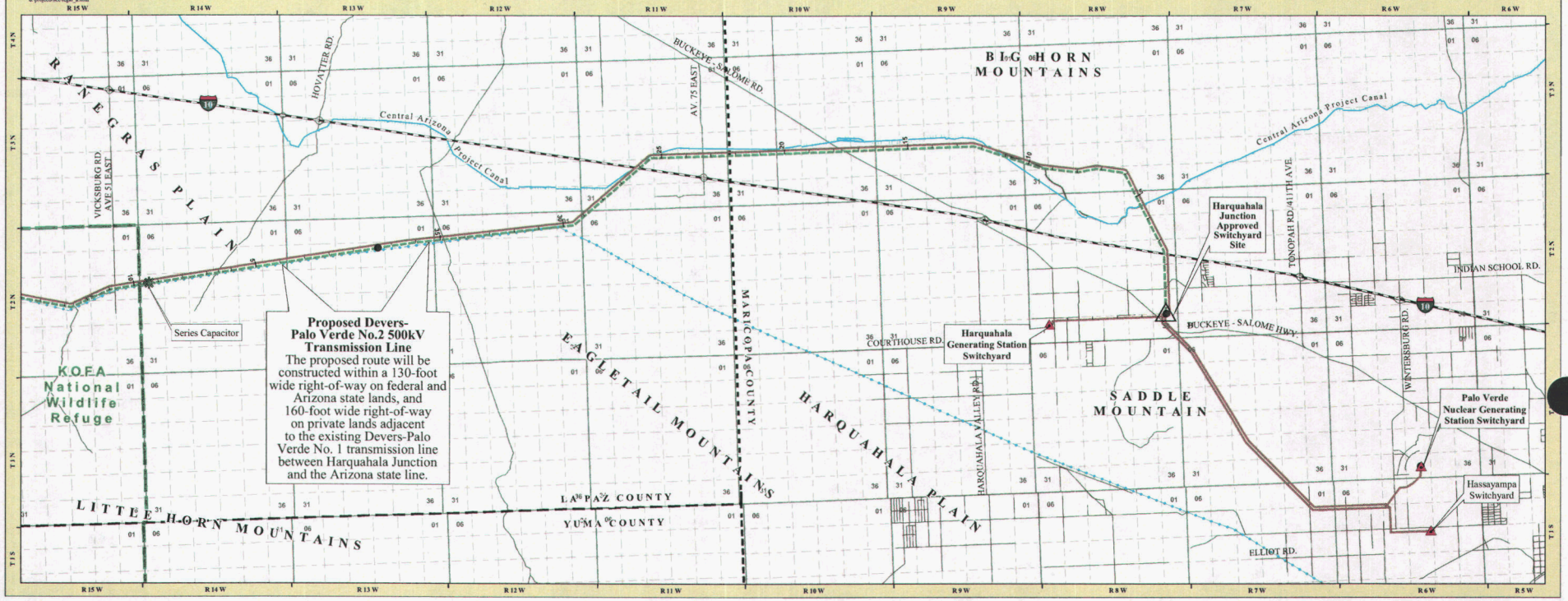


Proposed Devers-Palo Verde No.2 500kV Transmission Line

The proposed route will be constructed within a 130-foot wide right-of-way on federal and Arizona state lands, and 160-foot wide right-of-way on private lands adjacent to the existing Devers-Palo Verde No. 1 transmission line between Harquahala Junction and the Arizona state line.

Decision No. 69638

Devers - Palo Verde No. 2 Transmission Line Project

EXHIBIT A

Panel 2 of 2

Sources

United States Geological Survey (USGS), hillshade derived from USGS 30-meter Digital Elevation Models. Land use data, EPG, Inc. 2003.

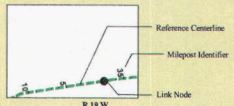
Legend

- Proposed 500kV Transmission Line Route
- Existing 500kV Transmission Line

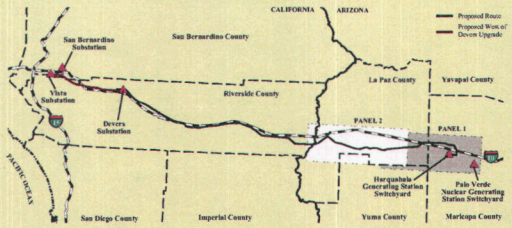
General Reference Features

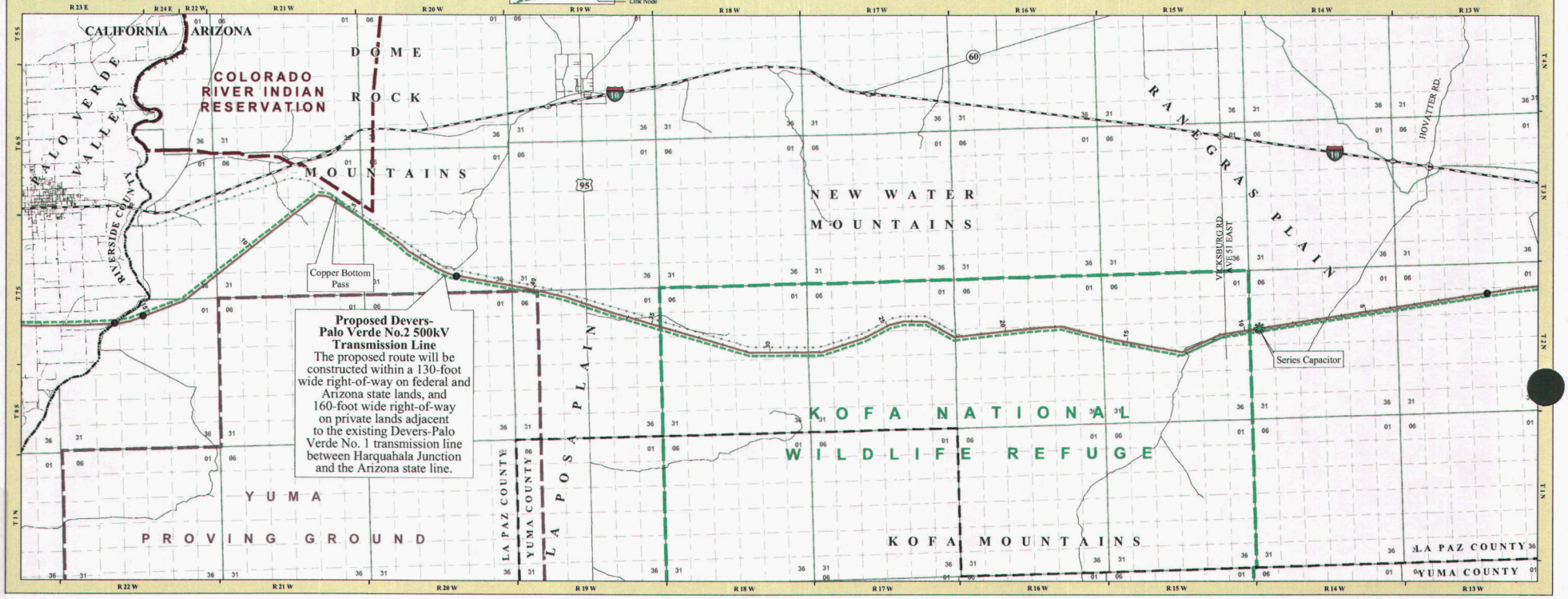
- State Boundary
- County Boundary
- Interstate/Highway
- Central Arizona Project Canal
- Natural Gas Pipeline
- Roads
- Township and Range

Line separation is shown for illustrative purposes and is not to scale.

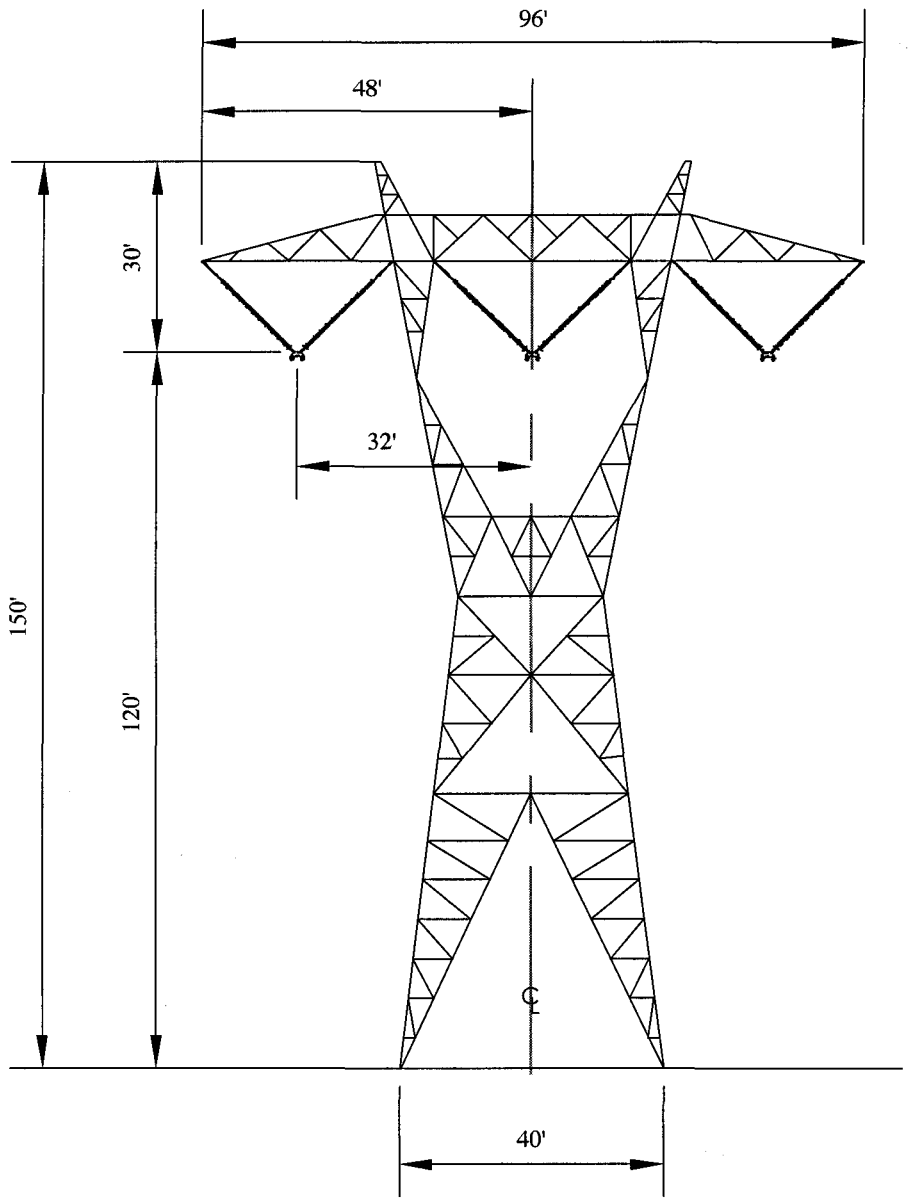


Panel Index Map





Decision No. 69638

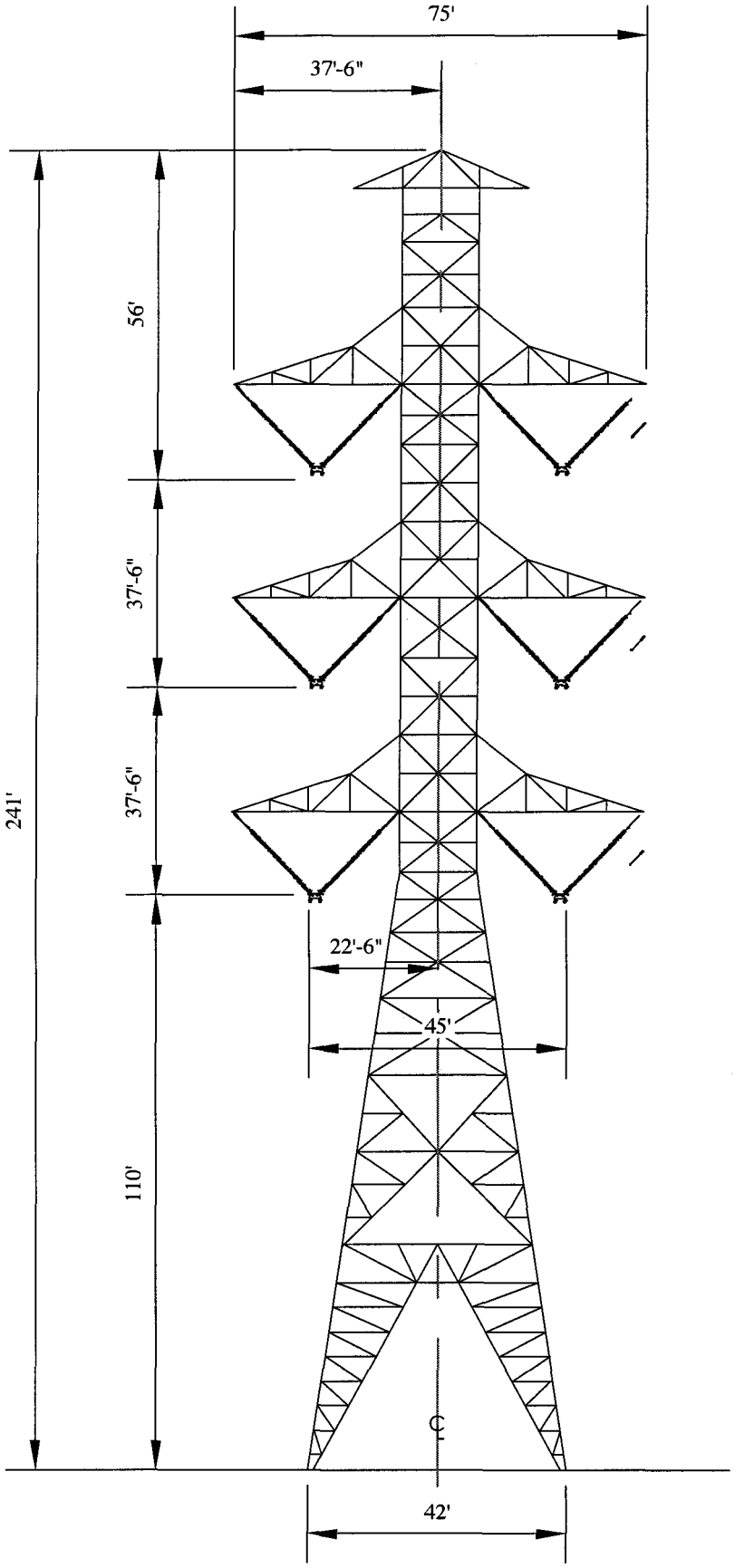


Note:
Dimensions are approximate and may vary with site conditions.

Exhibit G-1
Proposed 500kV Single-Circuit
Lattice Steel Tower

Exhibit B (1 of 2)

Decision No. **69638**



Note:
Dimensions are approximate and may vary with site conditions.

Exhibit G-3
Existing 500kV Double-Circuit
Lattice Steel Tower

Decision No. **69638**

EXHIBIT C
Condition No. 16
Mitigation Measures Applicable Within the Kofa National Wildlife Refuge

B-1a Prepare and implement a Habitat Restoration/Compensation Plan. SCE shall restore all areas disturbed by project construction, including temporary disturbance areas around tower construction sites, laydown/staging areas, temporary access and spur roads, and existing tower locations that are removed during construction of the Proposed Project. Where onsite restoration is planned for mitigation of temporary impacts to sensitive vegetation communities, SCE shall identify a qualified Habitat Restoration Specialist to be approved by the CPUC/BLM. Hydroseeding, drill seeding, or an otherwise proved restoration technique shall be utilized on all disturbed surfaces using a locally endemic native seed mix approved by the CPUC/CDFG/AGFD/FWS and BLM. SCE shall flag the limits of disturbance at each construction site. The Plan shall incorporate the measures identified in the June 2006 Memorandum of Understanding regarding vegetation management along rights-of-way for electrical transmission and distribution facilities on Federal lands. In project areas that occur in the WRCMSHCP plan area, SCE shall use the applicable Best Management Practices identified in the WRCMSHCP. The creation or restoration of habitat shall be monitored for five years after mitigation site construction, or until established success criteria are met, to assess progress and identify potential problems with the restoration site. Remedial activities (e.g., additional planting, weeding, or erosion control) shall be taken during the monitoring period if necessary to ensure the success of the restoration effort. If the mitigation fails to meet the established performance criteria after the five-year maintenance and monitoring period, monitoring shall extend beyond the five-year period until the criteria are met or unless otherwise noted by the CPUC/BLM.

B-1b Coordinate tower placement with USFWS/BLM. Where the proposed route crosses the Kofa National Wildlife Refuge, SCE shall coordinate with the U.S. Fish and Wildlife Service, Division of Refuges' refuge management personnel to determine specific tower site and spur road locations in order to minimize habitat disturbance and/or the loss of valuable habitat features. SCE shall demonstrate compliance with this measure prior to construction.

B-2a Conduct invasive and noxious weed inventory. SCE shall survey the project corridor, including access roads, for populations of invasive and noxious weeds prior to the start of construction. All populations of invasive and noxious weeds within 500 feet of each tower location shall be flagged prior to construction. The Applicant shall submit a Noxious Weed Control Plan to BLM, CPUC, ADGF, CDFG, and/or USFWS at least 60 days prior to the start of construction. The weed control plan shall specify the location of existing weed populations; measures to control introduction and spread of noxious weeds in the project corridor; worker training, specifications, and inspection procedures for construction materials and equipment used in the project corridor; post-construction monitoring for noxious weeds; and eradication and control methods.

Known populations of invasive and noxious weeds in the project corridor shall be evaluated by BLM, CPUC, CDFG, and USFWS to identify candidates for eradication. Selected weed populations shall then be eradicated prior to construction. All seeds and straw material shall be certified weed free. All gravel and fill material used during project construction and maintenance shall be certified weed free by the local County Agriculture Commissioner's Office.

B-2b Implement control measures for invasive and noxious weeds. SCE shall adhere to the BLM management guidelines for reducing the potential for the introduction of noxious weeds and invasive, non-native plant species by implementation of the following standards:

- **Wash all equipment and vehicles.** Vehicles and all equipment must be washed BEFORE AND AFTER entering all project sites unless otherwise directed in writing by the BLM. This includes wheels, undercarriages, bumpers and all parts of the vehicle. In addition, all tools such as chain saws, hand clippers, pruners, etc., must also be washed BEFORE AND AFTER entering all project areas. For example, vehicles traveling into contaminated areas are the main dispersal mechanism for yellow star-thistle. All washing must take place where rinse water is collected and disposed of in either a sanitary sewer or a landfill.

- **Keep written logs.** When vehicles and equipment are washed, a daily log must be kept stating the location, date and time, types of equipment, methods used and staff present. The log shall contain the signature of the responsible crewmember.

- **Written logs will be available** for CPUC/BLM inspection and shall be turned in to BLM on a weekly basis.

- **Post-construction weed abatement on the Coachella Valley Preserve.** Post-construction follow-up weed abatement will be conducted on the work areas within the Coachella Valley Preserve and Kofa National Wildlife Refuge. Weed abatement will be conducted during the spring following construction and prior to when the weeds establish flowers or produce seeds.

B-5a Conduct pre-construction surveys and monitoring for breeding birds. SCE shall conduct protocol level surveys for nesting birds if construction activities are scheduled to occur during the breeding season for raptors and other migratory birds. Surveys shall be conducted in areas within 500 feet of tower sites, laydown/staging areas, substation sites, and access road/spur road locations. SCE shall be responsible for designating a CPUC/BLM-approved qualified biologist who can conduct pre-construction surveys and monitoring for breeding birds. If State or federally listed birds with active nests are found, a biological monitor shall establish a 500-foot buffer around the nest and no activities will be allowed within the buffer until the young have fledged from the nest or the nest fails. The biological monitor shall conduct regular monitoring of the nest to determine success/failure and to ensure that project activities are not conducted within the 500-foot buffer until the nesting cycle is complete or the nest fails. The biological monitor shall be responsible for documenting the results of the surveys and the ongoing monitoring. A 300-foot buffer shall be implemented in the event that raptors or other species protected under the MBTA are located. This buffer will be evaluated after consultation with the CPUC/BLM/CDFG/and USFWS.

B-6a Develop a transplanting plan. In coordination with the BLM, SCE shall prepare a transplanting plan in compliance with both Arizona and California laws and regulations regarding native and sensitive plants, prior to project construction activities. The plan will provide details on the plants being transplanted, including which species and how many individuals of each species; where the plants will be transplanted; how the plants will be transplanted; how the plants will be maintained during the transplanting efforts; and if the plants will be used to re-vegetate disturbed areas of the construction site. As a condition of the plan, a preconstruction survey will be conducted to mark (using bright-colored flagging) all plants that will be transplanted. Some cacti will need to be transplanted facing the same direction as they currently face (in other words, the north side of the plant must stay facing the north); these cacti will be identified in the plan and appropriately marked to identify which side faces north. For listed plant species SCE shall identify if the plants can be avoided. If avoidance is not possible, SCE shall purchase off site mitigation in coordination with the USFWS and CDFG.

B-7b Conduct pre-construction tortoise surveys. Prior to construction, SCE shall survey the transmission line corridor for desert tortoise burrows and pallets within fourteen (14) days preceding

construction. Tortoise burrows and pallets encountered within the construction zone (if any) will be conspicuously flagged by the surveying biologist(s) and avoided during all construction activities.

- During construction activities, SCE shall inspect under equipment and vehicles prior to moving equipment. If tortoises are encountered, the vehicle will not be moved until such animals have voluntarily moved to a safe distance away from the parked vehicle or a qualified biologist moves the tortoise.

- SCE shall monitor construction activities in all areas with the potential to support desert tortoise.

- Desert tortoises will be handled only by a FWS/CDFG permitted and authorized tortoise handler and only when necessary. New latex gloves will be used when handling each desert tortoise to avoid the transfer of infectious diseases between animals. Desert tortoises will be moved the minimum distance possible within appropriate habitat to ensure their safety. In general, desert tortoises will not be moved in excess of 1,000 feet for adults and 300 feet for hatchlings.

- Desert tortoises that are found above ground and need to be moved will be placed in the shade of a shrub. All desert tortoises removed from burrows will be placed in an unoccupied burrow of approximately the same size as the one from which it was removed. All excavation of desert tortoise burrows will be done using hand tools, either by, or under the direct supervision of, an authorized tortoise handler. If an existing burrow is unavailable, an authorized tortoise handler will construct or direct the construction of a burrow of similar shape, size, depth, and orientation as the original burrow. Desert tortoises moved during inactive periods will be monitored for at least two days after placement in the new burrows to ensure their safety. An authorized tortoise handler will be allowed some judgment and discretion to ensure that survival of the desert tortoise is likely.

- If desert tortoises need to be moved at a time of the day when ambient temperatures could harm them (less than 40 degrees F or greater than 90 degrees F), they will be held overnight in a clean cardboard box. These desert tortoises shall be kept in the care of an authorized tortoise handler under appropriate controlled temperatures and released the following day when temperatures are favorable. All cardboard boxes will be appropriately discarded after one use.

- All desert tortoises moved will be marked for future identification. An identification number using the acrylic paint/epoxy covering technique should be placed on the fourth costal scute. No notching would be authorized.

B-7c Purchase mitigation lands for impacts to tortoise habitat. Following construction, SCE shall acquire lands to compensate for the loss of tortoise habitat within the Category II and III management areas in Arizona and California. The amount of land to be acquired will depend on the acreage of disturbance within these management areas. Acquired lands will be in a nearby area of good tortoise density and within tortoise habitat. BLM and SCE shall conduct a field inspection of the disturbed areas after completion of construction of the transmission line to determine the exact acreage required for compensation. The lands purchased will be transferred to the United States and be administered by the BLM. Land may be transferred to the BLM and/or incorporated into an existing management area.

B-9a Conduct pre-construction surveys. SCE shall conduct pre-construction surveys for sensitive wildlife in any area subject to project disturbance. Surveys shall be conducted during a time of year when these species are known to be active. The location of sensitive species identified during the pre-construction surveys shall be identified on project maps.

B-9b Conduct biological monitoring. SCE shall conduct biological monitoring of the project area including the laydown, staging, access roads, and any area subject to project disturbance. The biological monitor shall look for sensitive wildlife species (including forest watch list animals and Forest Service Region 5 sensitive species) that may be located within or immediately adjacent to the construction areas. If sensitive species are found, the biological monitor shall move them out of harm's way (listed species require take authorization) to avoid direct impacts to these species. In the event that the wildlife species may cause harm to the biologist, the biologist shall notify the construction crews and monitor the species until it moves out of harms way. The results of all monitoring shall be recorded in daily monitoring notes that shall be included as part of the required monitoring reports for the project. The SCE shall notify the CPUC/BLM if any sensitive species are located during construction of the project. SCE shall notify the Forest Service of all sensitive species found on Forest Service land.

B-9c Implement a Worker Environmental Awareness Program. A Worker Environmental Awareness Program (WEAP) shall be implemented for construction crews by a qualified biologist(s) provided by SCE and approved by the CPUC/BLM prior to the commencement of construction activities. Training materials and briefings shall include but not be limited to, discussion of the Federal and State Endangered Species Acts, the consequences of noncompliance with these acts, identification and values of sensitive plant and wildlife species and significant natural plant community habitats, fire protection measures, sensitivities of working on forest service lands and identification of Forest Service sensitive species and MIS wildlife species, hazardous substance spill prevention and containment measures, and review of mitigation requirements. Training materials and a course outline shall be provided to the CPUC and BLM for review and approval at least 30 days prior to the start of construction. Training materials and updates of training materials shall also be provided to the Forest Service for review and comment. SCE shall provide to the CPUC and BLM a list of construction personnel who have completed training, and this list shall be updated by SCE as required when new personnel start work. No construction worker may work in the field for more than 5 days without receiving the WEAP.

B-9d Conduct pre-construction reptile surveys. Prior to construction, SCE shall conduct surveys in areas of suitable habitat for Sonoran desert tortoise, common chuckwalla, banded Gila monster, and desert rosy boa within 48 hours prior to the start of construction activities. If common chuckwallas, banded Gila monsters and/or desert rosy boas are found on the construction site, they will be relocated to nearby suitable habitat outside the construction area. Following the clearance surveys, exclusion fencing will be erected or a biological monitor will be onsite during construction activities.

- If potentially suitable burrows or rock piles are found, they will be checked for occupancy. Occupied burrows will be flagged and avoided (employing a 50-foot buffer) during construction. If the burrow cannot be avoided, it will be excavated and the occupant relocated to an unoccupied burrow outside the construction area and of approximately the same size as the one from which it was removed. If an existing burrow is unavailable, the biologist will construct or direct the construction of a burrow of similar shape, size, depth, and orientation as the original. Trenches, holes, or other excavations will be examined for banded Gila monster prior to filling. If individuals are found, the biological monitor will relocate them to nearby suitable habitat.
- During construction, if a common chuckwalla, banded Gila monster, and/or desert rosy boa occur on the project site, construction activities adjacent to the individual's location will be halted and the animal will be allowed to move away from the construction site. If the individual is not moving, a qualified biologist will relocate it to nearby suitable habitat outside the construction area. It shall be placed in the shade of a shrub. The Forest Service will be notified of any sensitive wildlife identified on NFS lands. Also during construction, if a Sonoran desert tortoise occurs on the project site, construction activities adjacent to the individual's location will be halted and the *Guidelines for Handling Sonoran Desert Tortoises Encountered During Construction Projects* will be followed by qualified personnel.

B-9f Perform construction outside of breeding and lambing period. Construction activities conducted within suitable habitat near Burnt Mountain, Harquahala Mountain, and Kofa NWR shall not occur during the period of the year when bighorn sheep are lambing (from January 1 to April 30). A pre-construction survey for bighorn sheep shall be conducted on Forest Service lands prior to construction and maintenance of the transmission lines. If bighorn sheep are found, then SCE shall consult with the Forest Service, USFWS, and Bighorn Institute to identify appropriate avoidance measures.

B-15a Utilize collision-reducing techniques in installation of transmission lines. SCE shall install the transmission line utilizing APLIC standards for collision-reducing techniques as outlined in "Mitigating Bird Collisions with Power Lines: The State of the Art in 1994 (APLIC, 1996)."

- Placement of towers and lines will not be located significantly above existing transmission line towers and lines, topographic features, or tree lines to the maximum extent practicable.

- Overhead lines that occur significantly above the above-mentioned features and that are located in highly utilized avian flight paths will be marked utilizing aerial marker spheres, swinging plates, spiral vibration dampers, bird flight diverters, avifauna spirals, or other diversion device as to be visible to birds and reduce avian collisions with lines.

B-16a Prepare and implement a raven control plan. SCE shall prepare a common raven control plan that identifies the purpose of conducting raven control, provides training in how to identify raven nests and how to determine whether a nest belongs to a raven or a different raptor species, describes the seasonal limitations on disturbing nesting raptors species (excluding ravens), describes the procedure for obtaining a permit from the USFWS's Division of Migratory Birds, and describes procedures for documenting the activities on an annual basis. SCE shall gain approval of the plan from the USFWS's Division of Migratory Birds. SCE shall provide this raven control plan to all transmission line companies that conduct operations within the ROW.

Visual Resources

V-1a Reduce visibility of construction activities and equipment. Substation construction sites and all staging and material and equipment storage areas, including storage sites for excavated materials shall be appropriately located away from areas of high public visibility. If visible from nearby roads, residences, public gathering areas, or recreational areas, facilities, or trails, construction sites and staging and storage areas shall be visually screened using temporary screening fencing. Fencing will be of an appropriate design and color for each specific location. Additionally, avoid construction in areas visible from recreation facilities and areas during holidays and periods of heavy recreational use. This measure encompasses BLM permit requirements B-7.1 and B-7.2. SCE shall submit final construction plans demonstrating compliance with this measure to the BLM and CPUC for review and approval at least 60 days prior to the start of construction.

V-2a Reduce in-line views of land scars. Construct access or spur roads at appropriate angles from the originating, primary travel facilities to minimize extended, in-line views of newly graded terrain. Contour grading should be used where possible to better blend graded surfaces with existing terrain. SCE shall submit final construction plans demonstrating compliance with this measure to the BLM and CPUC for review and approval at least 60 days prior to the start of construction.

V-3a Reduce visual contrast of towers and conductors. The following design measures shall be applied to all new structures and conductors in order to reduce the degree of visual contrast caused by the new facilities:

- All new and replacement structures are to as closely as possible match the design of the existing structures with which they will be seen.
- All new and replacement structures are to be paired as closely as possible with the existing structure(s) in the corridor in order to avoid or reduce the number of off-setting (from existing structures) tower placements.
- All new and replacement structures are to match the heights of the existing DPV1 structures to the extent possible as dictated by variation in terrain.
- All new and reconductored spans are to match existing conductor spans as closely as possible in order to avoid or reduce the occurrence of unnecessary visual complexity associated with asynchronous conductor spans, particularly at sensitive crossings such as Salome Highway, I-10, U.S. 95, Colorado River, SR 78, Dillon Road, SR 62, Whitewater Canyon Road, and San Timoteo Canyon Road.
- All new conductors are to be non-specular in design in order to reduce conductor visibility and visual contrast.
- To the extent feasible, no new access roads are to be constructed downhill from existing or proposed towers to reduce the potential for structure skylining.

Wilderness and Recreation

WR-1a Coordinate construction schedule and activities with the authorized officer for the recreation area. No less than 40 days prior to construction, SCE shall coordinate construction activities and the project construction schedule with the authorized officer of the recreation areas listed below. SCE shall schedule construction activities to avoid heavy recreational use periods, including major holidays, in coordination with, and at the discretion of the authorized officer. SCE shall locate construction equipment to avoid temporary preclusion of recreation areas per the recommendations of the authorized officer. SCE shall also prepare a public notice of construction activities consistent with Mitigation Measure L-1a (Prepare Construction Notification Plan). SCE shall document its coordination efforts with the authorized officer, and provide this documentation to the CPUC and the BLM 30 days prior to construction.

WR-2a Coordinate with USFWS to improve impacted areas within Kofa National Wildlife Refuge. SCE shall coordinate with the USFWS to improve impacted areas within the Kofa National Wildlife Refuge (NWR). The implementation of improvements would be conducted at the discretion of the authorized officer for the Kofa NWR, and may include the acquisition of private land in-holdings from willing sellers within the refuge boundaries, and the rehabilitation of abandoned mine sites and old roads within the refuge. SCE shall document its coordination with the authorized officer of the Kofa NWR, and must demonstrate that negotiations and subsequent improvements have been conducted to the satisfaction of the USFWS. Documentation shall be submitted to the CPUC and the BLM at least 30 days prior to operation of the project.