



DESERT RENEWABLE ENERGY CONSERVATION PLAN

Preliminary Conservation Strategy Map

Desert Renewable Energy Conservation Plan

Stakeholder Meeting

October 12, 2011

REAT Agencies



Preliminary Conservation Strategy Map

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Presentation Outline

- Overview
- Review of Map Assembly and Data Layers
- PCS Map Categories and Description

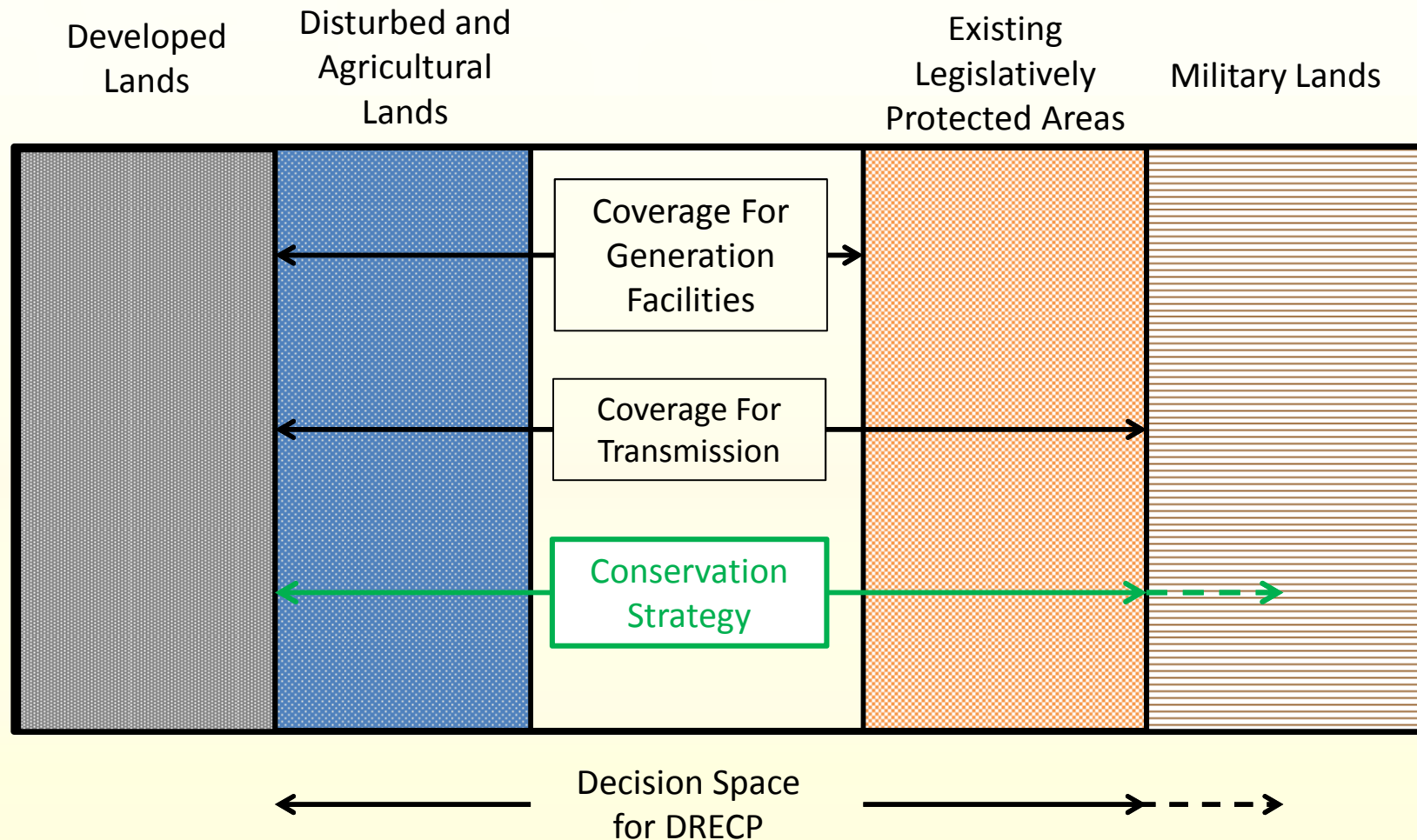




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Plan Structure Context





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Overview

- The PCS map is an important building block in process of identifying:
 - alternative conservation strategies for the DRECP
 - ultimately the preferred conservation strategy
- Future DRECP maps will reflect stakeholder feedback on the PCS map and additional information as it becomes available.
- The PCS map does not have regulatory effect and is not intended to govern how projects are reviewed or permitted



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Overview

- Purpose of the PCS Map
 - synthesize available physical, biological, and land use data in a single map
 - develop the first preliminary draft of Renewable Energy Study Areas in which renewable energy development may be focused in one or more conservation strategy alternatives.
 - develop the first preliminary draft of areas where DRECP conservation actions would be focused.



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Overview

- Moderate to high biological value areas are the areas within which the DRECP preserve system will be developed
- Opportunities for renewable energy development exist within several map categories (Agriculture, Low Biological Value Areas, Moderate to High Biological Value Area, Other Managed and Designated Areas) subject to appropriate criteria



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Review of Map Assembly and Data Layers

- **Energy Components**
 - Renewable energy resource layers

- **Biological Elements**
 - Species, community and process layers

- **PCS Map Categories**

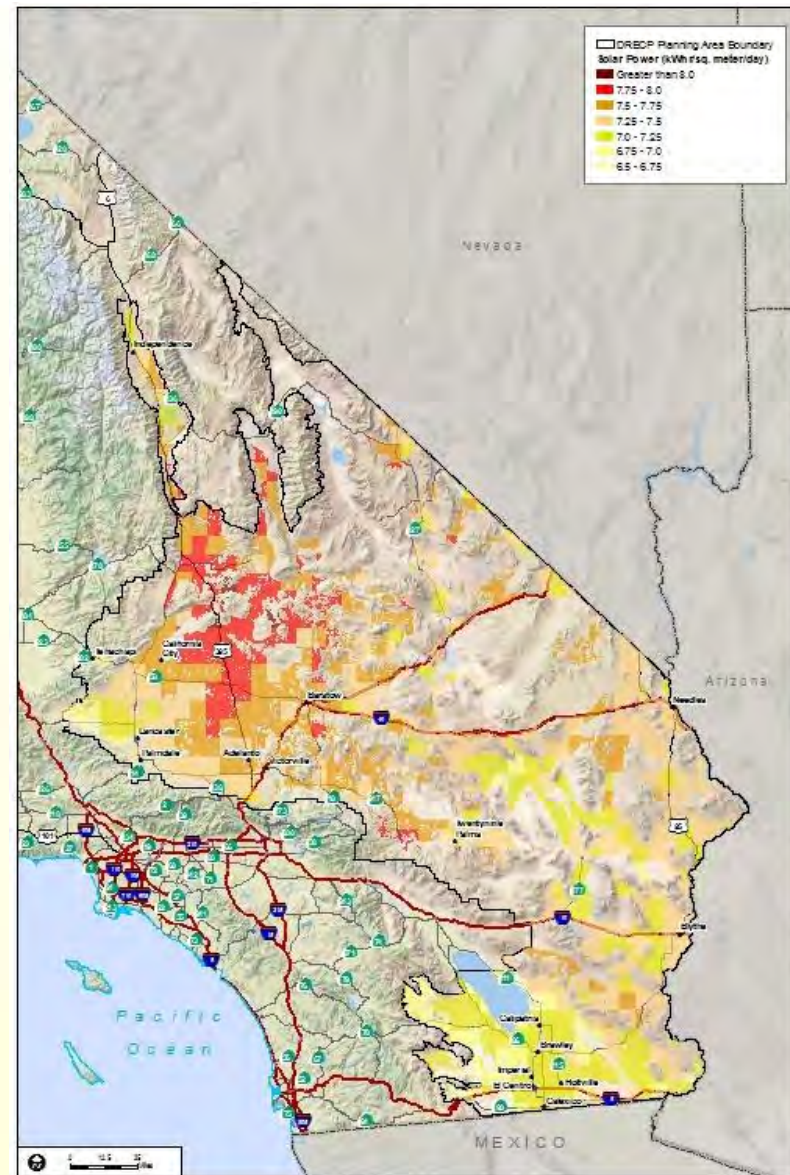


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Energy Components

- Solar Insolation
 - Direct normal insolation (NREL 2009)





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Energy Components

- CEERT Solar Development Areas





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Energy Components

- Wind Resource
 - 50-meter wind speed data, unconstrained (NREL 2009)





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Energy Components

- CALWEA Wind Development Areas
 - AMS TrueWind-NREL (2010) 80-meter data refined by constraints





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Energy Components

- Geothermal Resources
 - Dept. of Conservation Known Geothermal Resources Areas (KGRAs)
 - BLM geothermal lease areas





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Biological Elements

- Selection of the biological elements used to develop the PCS map was strategic and designed to include:
 - Umbrella species
 - Wide ranging species that serve as proxies for other desert species
 - Narrow range species
 - Narrowly distributed and endemic species
 - Vegetation community and process elements
 - Proxies for species with specific habitat affiliations
- PCS map based on a subset of biological elements that will ultimately be considered for the DRECP



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Biological Elements

- Bighorn Sheep
 - Mountain habitat
 - Intermountain habitat
 - Critical linkage areas
 - Umbrella species element





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Biological Elements

- Mohave ground squirrel
 - Conservation and recovery area
 - Umbrella species element



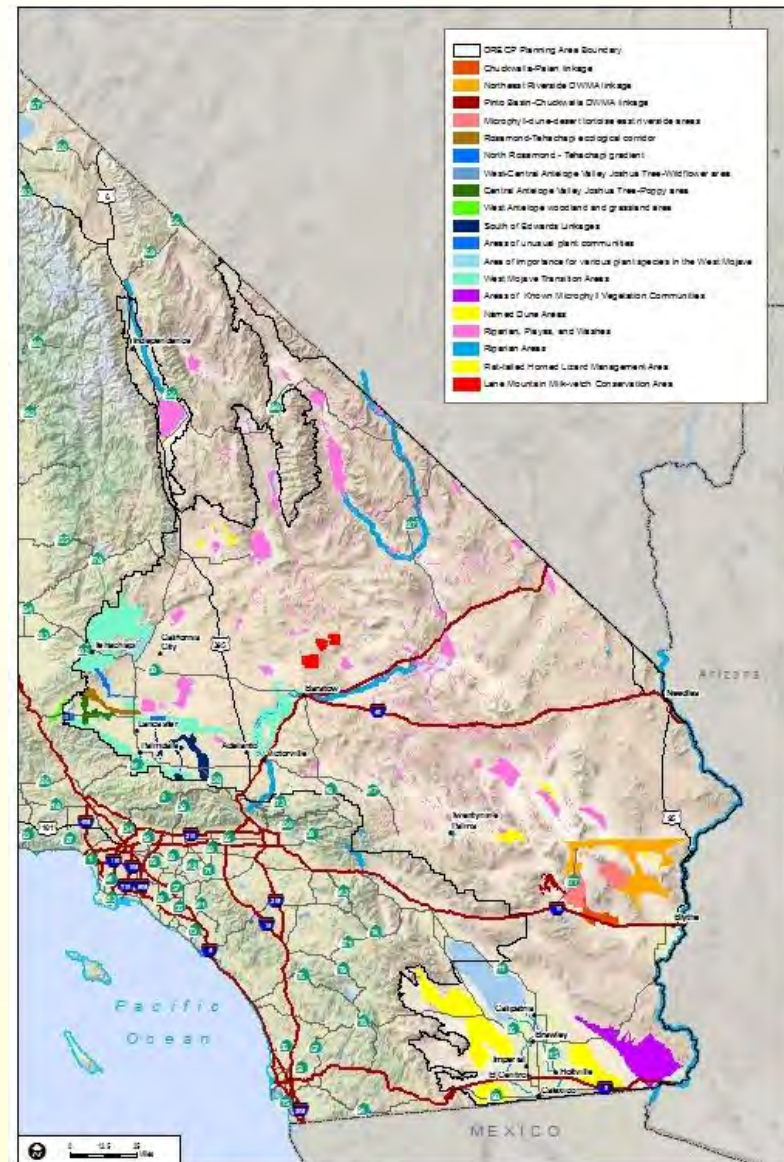


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Biological Elements

- Natural Community / Process Elements
 - West Mojave
 - East Riverside
 - Microphyll vegetation
 - Dunes
 - Riparian, playas, washes





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Biological Elements

- Composite of all Biological Elements
 - Moderate to High Biological Value Areas





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Preliminary Conservation Strategy Map Categories

-  Agriculture
-  Developed Lands
-  Military Lands
-  BLM OHV Lands (overlay of  Special Recreation Management Areas)
-  SVRA Lands
-  Salton Sea



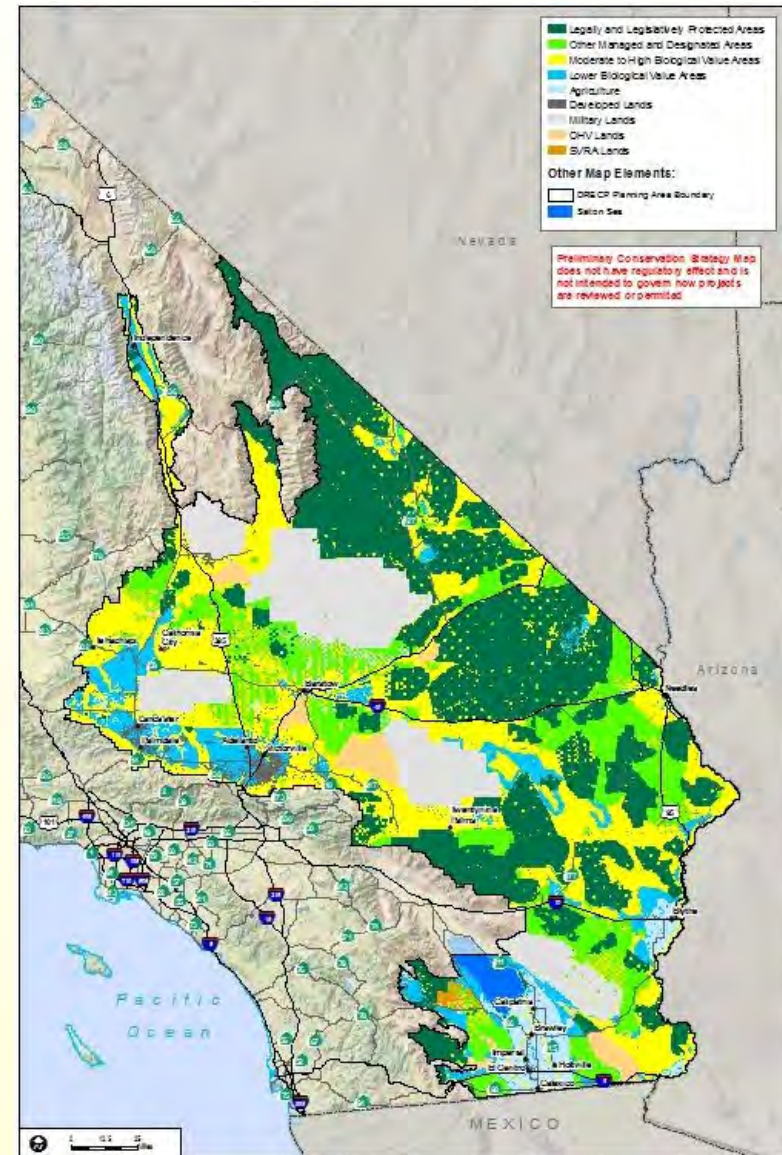


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- Legally and Legislatively Protected Areas
- Other Managed and Designated Areas
- Moderate to High Biological Value Areas
- Lower Biological Value Areas





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Considerations in identification of Renewable Energy Study Areas

Energy Resources

- Solar Insolation
- Wind (map is not complete for wind)
- Geothermal (KGRA and BLM lease areas)
- Proximity to existing transportation

Transmission

- Near load centers
- Near existing transmission infrastructure

Biological

- Focus in Lower Biological Value Areas
- Avoid Moderate to High Biological Value Areas



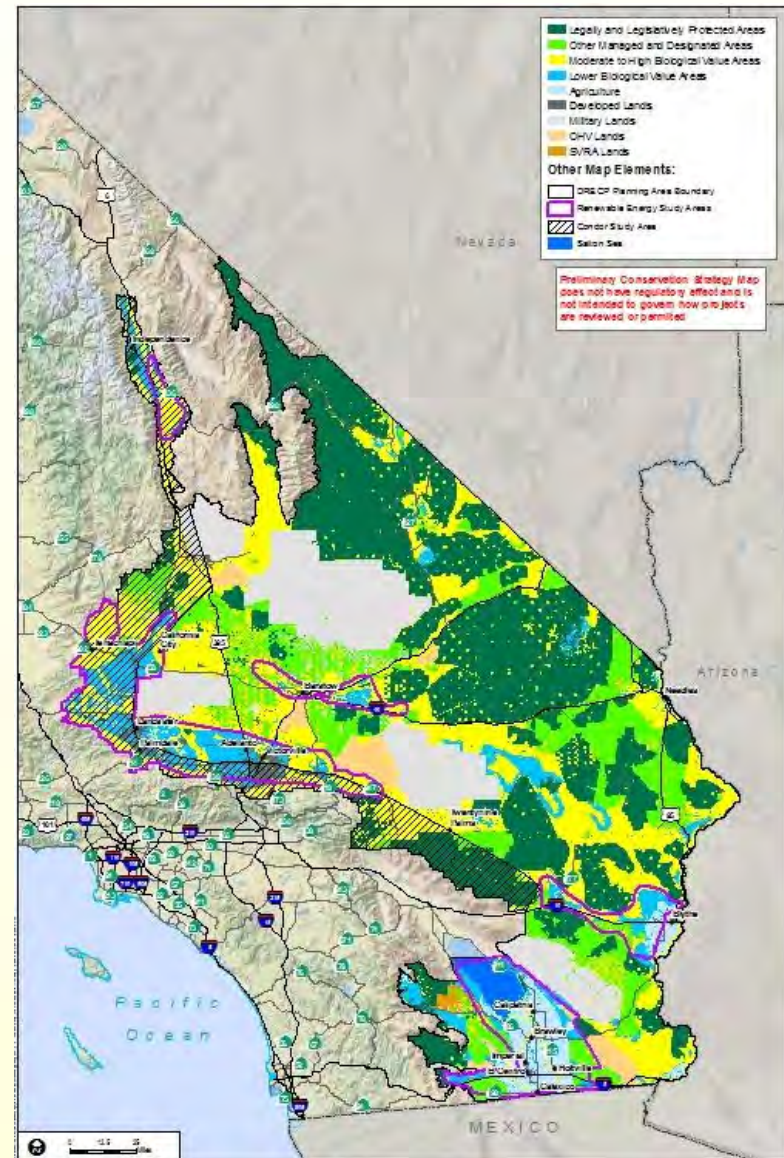
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Preliminary Conservation Strategy Map Categories

Renewable Energy Study Areas

- Generalized areas within which renewable energy focus areas could be identified that would result in fewer conflicts with biological resources
- Refinements (additions, deletions, reconfigurations) will occur as the planning process proceeds





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Acresage Summary Table

Map Category	Total Acresage
Agriculture	683,354
Developed Lands	374,039
Legally and Legislatively Protected Areas	7,424,588
Lower Biological Value Areas	1,775,468
Military Lands	2,991,061
Moderate to High Biological Value Areas	5,762,292
OHV Lands	513,289
Other Managed and Designated Areas	2,821,675
Salton Sea	190,273
SVRA Lands	50,939
Total	22,586,978