DOCKETED

Docket Number:	09-AFC-08C
Project Title:	Genesis Solar Energy Project
TN #:	203638
Document Title:	Genesis 2014 Annual Compliance Report, Part 2
Description:	Annual Report on Operational Activities for 2014 (March 7-December 31
Filer:	Eric Veerkamp
Organization:	Nextera Energy Resources
Submitter Role:	Applicant
Submission Date:	2/9/2015 1:34:49 PM
Docketed Date:	2/9/2015

ACKNOWLEDGEMENT OF RECEIPT

SITE ORIENTATION GUIDE

I have received a copy of the GENESIS SOLAR's Site Orientation Guide. I have read and understand it is my responsibility to abide by its contents and seek clarification of anything that is unclear to me.

Signed:

1-31-14

Date

delos Santos Salvador

(Print name)

American Fence Co.

Company or Contractor Name

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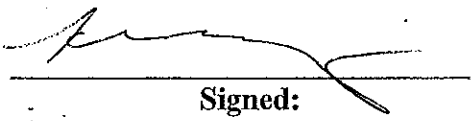

Signed:

1/31/14

Date

KEVIN KRUEGER

(Print name)

SENTRY EQUIPMENT CORP

Company or Contractor Name

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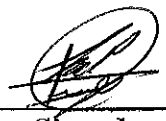

Signed:

1-7-2014

Date

Raul Cardoso

(Print name)

Brand

Company or Contractor Name

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Signed: _____ Date: 1.7.14

Alfredo Guzman
(Print name)

Brand
Company or Contractor Name

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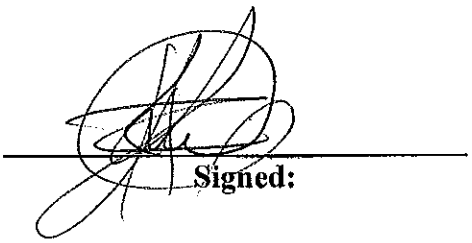

Signed:

1/7/14
Date

Jose Sincuir
(Print name)

Brand/Long Beach
Company or Contractor Name

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Signed: _____ Date: 01/07/2014

CRESPO JOEL
(Print name)

Brand/Petrochem
Company or Contractor Name

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Dion Williams
Signed:

1-7-14
Date

Dion Williams
(Print name)

BRANDSCAFFOLD
Company or Contractor Name

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(Print name) _____

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Company or Contractor Name

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Signed:

1-7-14

Date

Maximiliano Montes De Oca

(Print name)

BRAND

Company or Contractor Name

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Laffit Montes De Oca

(Print name)

BRand

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JESSE ROSALES
(Print name)

BRand
Company or Contractor Name

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Signed: _____ Date: 1-7-14

Signed:

Date

Ryan Frye

(Print name)

Brand

Company or Contractor Name

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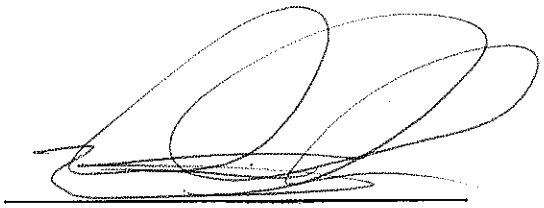

Signed:

01/07/14

Date

MAURICE THOMAS

(Print name)

BRAND ENERGY

Company or Contractor Name

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Fernando Aguallo
Signed:

1-7-14
Date

Fernando Aguallo
(Print name)

Brand Scaffold
Company or Contractor Name

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Signed: _____ Date: 01/07/2014

(Print name)

BRAND

Company or Contractor Name

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Signed: _____ Date: 01-07-14

(Print name): HELIOS MORITO

Company or Contractor Name: BRAND SCAFFOLD

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Alcadio Garza
Signed:

1-7-14
Date

Alcadio Garza
(Print name)

GENESIS
Company or Contractor Name

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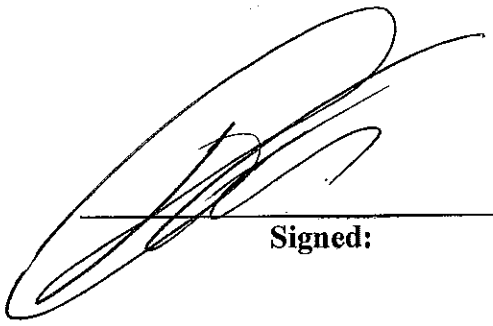

Signed:

1.7.19
Date

JEFF CALDERON
(Print name)

BRAND
Company or Contractor Name

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Eric Garcia
Signed:

1-7-14
Date

Eric Garcia
(Print name)

Brand
Company or Contractor Name

BIO 16 - Avian Protection plan

Verification: No less than 30 days prior to the start of construction-related ground disturbance activities the Project owner shall submit to the CPM, USFWS and CDFG a final Avian Protection Plan. Modifications to the Avian Protection Plan shall be made only after approval from the CPM.

For one year following the beginning of power plant operation the Designated Biologist shall submit quarterly reports to the CPM, CDFG, and USFWS describing the dates, durations, and results of monitoring. The quarterly reports shall provide a detailed description of any Project-related bird deaths or injuries detected during the monitoring study or at any other time, and describe adaptive management measures implemented to avoid or minimize deaths or injuries.

Following the completion of the fourth quarter of monitoring the Designated Biologist shall prepare an Annual Report that summarizes the year's data, analyzes any Project-related bird fatalities or injuries detected, and provides recommendations for future monitoring and any adaptive management actions needed.

No later than January 31st of every year the Annual Report shall be provided to the CPM, CDFG, and USFWS. Quarterly reporting shall continue until the CPM, in consultation with CDFG and USFWS determine whether more years of monitoring are needed, and whether mitigation and adaptive management measures are necessary. After two years of data collection the project owner or contractor shall prepare a report that describes the study design and monitoring results of the Avian Protection Plan. The report shall be submitted to the CPM, CDFG and USFWS no later than the third year after onset of Project operation.

Specimen Number *	How to Use the Search Box: You may either start typing your choice or click on the arrow on the right hand side of the search bar to view all choices. Once you locate the appropriate choice, you can highlight the text and then hold down the CTRL button while pressing C on your SPECIES COMMON NAME SEARCH BOX: Species Common Name (AOU English Name) *	Discovery Date *	Name of individual discovering injury/mortality	Condition of Bird/Carcass (or if Active Nest Relocation, please indicate that here)*	Transect/Subplot Number *	Where found: GPS Latitude (decimal degrees)*	Where found: GPS Longitude (decimel degrees)*	Habitat surrounding carcass	Project feature where injured bird/carcass was found*	Project feature where injured bird/carcass was found* (use if more than one feature found)	Additional Information and Notes (Band information, other identifying numbers, mitigating conditions)
N/A	Pigeons & Doves	1/9/2014	Eric German	Dead, fresh (eyes moist)	N/A	33.66582	-114.99642	Other (note)	Project Building	N/A	Found in access road. Seen alive earlier in day. Rock dove found in access road to unit 1 power block, bird removed from access road by worker to prevent further damage to carcass. Collected at trailer and trailer coordinates used for reporting Band AU 2011 ARPU 79363. 1450 left message of mortality.
N/A	Rock Wren	1/13/2014	Eric German	Broken up	N/A	33.65419	-114.97412	Bare Ground	Fencing	Transmission Tower	2nd ROWR carcass about 5 meters to east at 33.65414, -114.97407. Both mortalities in former laydown of piping.
N/A	Rock Wren	1/13/2014	Eric German	Broken up	N/A	33.65414	-114.97407	Bare Ground	Fencing	Transmission Tower	Both mortalities in former laydown of piping.
N/A	American Kestrel	1/29/2014	Eric German	Broken up	N/A	33.65588	-114.98087	Bare Ground	Solar Trough	Other	Partial carcass, tail and feet. Other remains not found. Located beneath solar trough in small amount of vegetation surrounded by bare ground. 4 feet NE of caisson. Carcass likely to have been predated upon.
N/A	Ruddy Duck	2/11/2014	Andrew Fisher	Alive, sick	N/A	33.66919	-114.99774	Other (note)	Evaporation Pond	N/A	Duck observed on netting at 0635, at 1100 duck was on edge of netting and retrievable, duck collected and taken to Blythe rehabilitation center, duck appeared to be uninjured but dehydrated.
N/A	White-Throated Swift	2/13/2014	Ron Walker	Dead, fresh (eyes moist)	N/A	33.67097	-114.99803	Other (note)	Evaporation Pond	N/A	Small unidentified bird found floating in NW corner of the north evaporation pond. Bird was approximately 8 feet from edge of pond and not retrievable. Bird was size of a swallow or swift and dark overall color with a white rump patch. Bird was later identified as white-throated swift.
N/A	Unknown	2/19/2014	Ron Walker	Broken up	Unit 2 block 9 row 16	33.65737	-114.98177	Bare Ground	Other	N/A	In mirror trough field on bare ground, a small wing joint was found under edge of mirror array, approximately 9 feet away from edge of mirror. Unknown small bird species. No other bird parts found.

N/A	Unknown	2/19/2014	Eric German	Articulated skeletal	Unit 2 block 8 row 55	33.65956	-114.97445	Bare Ground	Other	N/A	Bird wing joint found on bare ground between mirror arrays, several primary feathers attached, desiccated, bone exposed, primaries 5-6 inches long faded from sun. No other bird parts found.
N/A	Eurasion Collared Dove	3/18/2014	Eric German	Broken up	Unit 2 block 3 row 8	33.66106	-114.98595	Graded	Solar Trough	Other	Eurasian Collared-Dove. Bird was desiccated and found blowing in the wind within a solar field, beneath solar trough. Contacted USFWS at 1100 and placed in freezer.
N/A	Lincoln's Sparrow	3/20/2014	Eric German	Alive, injured	N/A	33.66459	-114.99696	Other (note)	Water Treatment Building	N/A	The bird was found within the water treatment building. Site personnel reported. Biologist brought to rehab. The feathers were trimmed and the bird appears to be recovering. The bird was stuck on rat sticky paper with stuck crickets. Contacted USFWS LE.
N/A	Mourning Dove	4/10/2014	Ron Walker	Dead, fresh (eyes moist)	N/A	33.66925	-114.99757	Graded	Evaporation Pond	N/A	Mourning dove mortality on ground next to net of the middle portion of south boundary net fence of southern evap pond, bird on side of netting, carcass fresh and intact, 25 feet from waters edge.
N/A	Common Loon	4/14/2014	Ron Walker	Dead, semi-fresh (eyes desiccated, rigor mortis)	N/A	33.66925	-114.99695	Other (note)	Evaporation Pond	N/A	Adult male Common loon found dead on top of netting that covers the south evaporation pond. Approximately 10 feet above water surface. Bird left in place, unable to retrieve carcass. USFWS notified of mortality on 4/14/14.
	Unknown	5/5/2014		Mummified	South Evap pond			Water	Evap ponds	N/A	
1407221330	Brown-Headed Cowbird	7/22/2014	Adam Dobrzanski	Broken up	Between N&S ponds			Gravel	Solar Field	N/A	20144848 Found between North and South ponds
1407221331	American Avocet	7/22/2014	Mosley	Dead, fresh (eyes moist)		33.66459	-114.99696	Dirt	Solar Field	N/A	20144847 Unit 1 solar field
1407231013	Brown-Headed Cowbird	7/23/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Solar Field	Unit 1 Power Block	20144699 - Power Block Unit
1407250913	Unknown	7/25/2014	Mosley	Mummified					Solar Field	N/A	20414844- Unit 1
1407250914	Least Sandpiper	7/25/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Solar Field	N/A	20144824 - Unit 2 power block
1407291000	Brown-Headed Cowbird	7/29/2014	Willis	Dead, semi-fresh (eyes desiccated, rigor mortis)					Power block Unit 2	N/A	Power Block Unit 2
1407310730	Brown-Headed Cowbird	7/31/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Admin bldg	N/A	Admin Building

1407310731	Brown-Headed Cowbird	7/31/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Admin bldg	N/A	20144710-Unit 1 solar field
1407310830	Brown-Headed Cowbird	7/31/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Admin bldg	Power Block	20144699-Unit 1 power block
20144838	Brown-Headed Cowbird	7/31/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Admin bldg	Admin Area	20144838 -Found in admin area
1407311338	Unknown	7/31/2014	MILONE	Broken up					Solar Field	Solar Trough	20144847 - partial carcass found in Unit 1 solar field
140731	Killdeer	7/31/2014	MILONE	Dead, semi-fresh (eyes desiccated, rigor mortis)					Solar Field	N/A	20144848 - Found in Unit 2 Solar Field
073114-007	Unknown	7/31/2014	MILONE	Dead, semi-fresh (eyes desiccated, rigor mortis)					Evaporation Pond	N/A	
080114-001	Cowbird	8/1/2014	Fortin	Intact and fresh		33.665009	-114.998417		Parking Lot	N/A	33.6650090-0114.998417
080114-002	Cowbird	8/1/2014	Fortin	Intact and fresh		33.665009	-114.998417		Parking Lot	N/A	33.6650090-0114.998417
080114-003	Sparrow	8/1/2014	Wilson	Intact					Unit 1 power block	N/A	
080114-004	Sparrow	8/1/2014	Milone	intact					Unit 2 solar field	N/A	
080114-005	Sea Gull	8/1/2014	Milone	Head and wings					Unit 2 solar field	N/A	
080114-006	Lincoln sparrow	8/1/2014	Mark Nadeau	intact					Water treatment area near sump	N/A	
080414-001	Brown headed cowbird	8/4/2014	Wilson	intact					power block	N/A	
082814-001	Lincoln Sparrow	8/28/2014	Nadeau	intact					Unit 1 solar field	N/A	
090314-001	Mourning Dove	9/3/2014	Milone	intact						N/A	
91820141617	Raven	9/18/2014	Goguts	intact		33.6699	-114.99804		Evaporative ponds	Ponds	
10122014-001	Western Grebe	10/12/2014	Nelson	Intact					Power Block 2 DA deck	N/A	
10132014-S001	Duck	10/13/2014	Bistline	Intact		33.67015304	-114.9963635	In pond muck	North Pond	N/A	
10132014-001	black bird	10/13/2014	Bistline	Whole, in water		33.6701534	-114.9963635	In water	North Pond	N/A	
101314-002	Grebe	10/13/2014	Bistline	Whole		33.67015304	-114.9963635	in water	North Pond	N/A	
101314-003	Grebe	10/13/2014	Bistline	Whole		33.67015304	-114.9966345	in muck	North Pond	N/A	

101314-004	Grebe	10/13/2014	Bistline	Whole		33.67015304	-114.9963635	in muck	North Pond	N/A	
101314-005	Duck	10/13/2014	Bistline	Whole		33.67015304	-114.9963645	in muck	North Pond	N/A	
101314-006	Unknown	10/13/2014	Bistline	whole		33.67015304	-114.9963645	in muck	North Pond	N/A	
101314-007	Unknown	10/13/2014	Bistline	whole, old		33.67015304	-114.9963635	water	North Pond	N/A	
101314-008	Black-necked Stilt	10/13/2014	Bistline	whole		33.67015304	-114.9963635	water	North Pond	N/A	
101314-009	duck	10/13/2014	Bistline	whole		33.67010201	-114.9963854	water	North Pond	N/A	
101314-010	duck	10/13/2014	Bistline	whole		33.67010201	-114.9963854	water	North Pond	N/A	
101314-011	duck	10/13/2014	Bistline	whole		33.67012176	-114.9967869	water	North Pond	N/A	
101314-012	American Avocet	10/13/2014	Bistline	whole		33.6701147	-114.9968092	water	North Pond	N/A	
101314-013	Coot? Unknown	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014a	1st of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014b	2nd of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014c	3rd of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014d	4th of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014e	5th of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-018	Grebe	10/13/2014	Bistline	whole		33.67082956	-114.9977046	water	North Pond	N/A	
101314-019	duck	10/13/2014	Bistline	whole		33.67082956	-114.9977046	water	North Pond	N/A	
101314-020	Unknown	10/13/2014	Bistline	whole		33.67015304	-114.9963635	water	North Pond	N/A	
101314-021	Unknown	10/13/2014	Bistline	whole		33.67015304	-114.9963635	water	North Pond	N/A	
101314-021	Unknown	10/13/2014	Bistline	whole		33.67016943	-114.9965858	water	North Pond	N/A	
101314-022	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-023	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-024	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	

101314-025	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-026	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-027	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101414-002	Unknown	10/13/2014	German	intact				water	North Pond	N/A	
101414-001	Unknown	10/13/2014	German	intact				water	North Pond	N/A	
101314-S001a	1st of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S001b	2nd of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S001c	3rd of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S001d	4th of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S001e	5th of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S002	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S003	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S004	Unknown		Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S005	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S006	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S007	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S010	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101414-S001	Unknown	10/14/2014	German	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101514-S001a	1st of 4 dead birds (previously reported)	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101514-S001b	2nd of 4 dead birds (previously reported)	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101514-S001c	3rd of 4 dead birds (previously reported)	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101514-S001d	4th of 4 dead birds (previously reported)	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101614-IS001	American Coot	10/16/2014	Mosley	Alive, Injured	N/A	33.4012.1	-114.59504	Water	South Pond	NW corner	Taken to rehab and released
101814-001	Ruddy duck	10/18/2014	German	intact		33.40154	-114.59525	pond sludge	North Pond	N/A	
101814-002	Eared Grebe	10/20/2014	German	intact		33.40154	-114.59525	pond sludge	North Pond	N/A	
101814-003	Eared Grebe	10/20/2014	German	intact		33.40154	-114.59525	pond sludge	North Pond	N/A	

101814-004	Small swallow	10/20/2014	German	intact		33.40154	-114.59525	pond sludge	North Pond	N/A	
101814-S001	Eared Grebe	10/20/2014	German	Found floating in south pond		685612	11S3727363	water	South Pond	N/A	
101914-IS001	Eared Grebe	10/19/2014	German	Alive, distressed	N/A	33.40123	-114.59473	water	South Pond	NE corner	Taken to Blythe rehab and released
102014-S001	Pigeon	10/20/2014	German	Submerged in algae		3727368	11S0685641	algae	South Pond	N/A	
102014-S003	Unknown	10/20/2014	German	Submerged in algae				algae	South Pond	N/A	
102014-S002	Head of a bird (heron)	10/20/2014	German	Head (floating)		3727369	11S0685640	water	South Pond	N/A	
102114-IS001	Western Grebe	10/21/2014	Mosley	Alive, distressed	N/A			water	South Pond	north side	Taken to Blythe Rehab center who took it to river and released
102314-S001	Sandpiper	10/23/2014	German	Intact		33.40104	-114.59466	water	South Pond	N/A	
102614-S001	Sandpiper	10/26/2014	German	Intact		33.4012	-114.59502	water	South Pond	N/A	
102714-IS001	Western Grebe	10/27/2014	German	Alive, sick	N/A	33.40094	-114.59465	Water	South Pond	SE corner	Taken to IBR, euthanized by IBR
102814-S001	Eared Grebe	10/28/2014	German	Intact		33.4012	-114.59523	water	South Pond	N/A	
102914-S001	Barn swallow	10/29/2014	German	Head only		33.40115	-114.59466	water	South Pond	N/A	
102914-002	Lark	10/29/2014	Goguts	Intact		33.67108	-114.99666	dirt near frac tanks	Dirt near frac tanks	N/A	
103114-IS001	Eared Grebe	10/30/2014	German	Matted feathers, not buoyant, and had odor	N/A	33.40094	-114.59465	In transport	South Pond	N/A	Died in transport
110114-S001	Unknown	11/1/2014	German	No feathers, eyes or color	N/A	33.340121	-114.59504	Water	South Pond	Bottom of ramp	
110114-S002	Red Necked Phalarope	11/1/2014	German	intact	N/A	33.40111	-114.59466	Water	South Pond	east side	observed earlier in day alive, seen swimming.
110414-S001	Eared Grebe	11/4/2014	German	intact	N/A	33.40096	-114.59501	Water	South Pond	N/A	observed earlier in day alive, seen swimming.
110614-001	Western Grebe	11/6/2014	German	Partially scavenged	N/A	33.40362	-115.0105	dirt, near perimeter fence	Near perimeter fence, Unit 1	N/A	
110714-IS001	Western Grebe	11/7/2014	Mosley	Alive	N/A	33.67016943	-114.9965858	South Pond	South pond	N/A	Taken to IBR
111714-S001	Ruddy Duck	11/17/2014	German	Intact, in water.	N/A	33.40094	-114.59467	South Pond	South Pond	N	Site freezer
111714-S002	Unknown	11/17/2014	German	Disarticulating bones visible	N/A	33.4012	-114.59468	South Pond	South Pond	N/A	Site freezer
120814-N001	Eared Grebe	12/8/2014	Preslar	In tact in water	N/A	33.4012	-114.59467	North Pond	North Pond	N/A	Site freezer
120901-S001	Kildeer	12/9/2014	Preslar	Not in water. On land	N/A	33.40362	-114.99658	on land near south pond	South pond	N/A	Site freezer

BIO-19 - SPECIAL-STATUS PLANT Impact Avoidance, Minimization and Compensation

Verification: The Special-Status Plant Impact Avoidance and Minimization Measures shall be incorporated into the BRMIMP as required under Condition of Certification **BIO-7.**

Raw GPS data, metadata, and CNDDB field forms shall be submitted to the CPM within two weeks of the completion of each survey. A preliminary summary of results for the late summer/fall botanical surveys shall also be submitted to the CPM and BLM's State Botanist within two weeks following the completion of the surveys. If surveys are split into more than one period, then a summary letter shall be submitted following each survey period. The Final Summer-Fall Botanical Survey Report, GIS shape files and metadata shall be submitted to the BLM State Botanist and the CPM no less than 30 days prior to the start of ground-disturbing activities. The Final Report shall include a detailed accounting of the acreage of Project impacts to special-status plant occurrences. The draft conceptual Special-Status Plant Mitigation Plan shall be submitted to the CPM for review and approval no less than 30 days prior to the start of ground-disturbing activities.

The Project owner shall immediately provide written notification to the CPM, CDFG, USFWS, and BLM if it detects a State- or Federal-Listed Species, or BLM Sensitive Species at any time during its late summer/fall botanical surveys or at any time thereafter through the life of the Project, including conclusion of Project decommissioning.

If a Status and Distribution Study is proposed, the study shall commence no later than six months following the start of ground-disturbing activities. The draft study shall be submitted to the CPM and BLM Botanist for review and approval no more than two years following the start of ground-disturbing activities. The final study shall be submitted no more than 30 months following the start of ground disturbing activities.

If a Distribution Study is implemented as contingency mitigation, the study shall be initiated no later than 6 months from the start of construction. The implementation phase of the study shall be completed within two years of the start of construction.

Within 18 months of ground-disturbing activities, the Project owner shall transfer to the CPM or an approved third party the difference between the Security paid and the actual costs of (1) acquiring compensatory mitigation lands, completing initial protection and habitat improvement , and funding the long-term maintenance and management of compensatory mitigation lands; and/or (2) implementing and providing for the long-term protection and monitoring of habitat enhancement or restoration activities.

Implementation of the special-status plant impact avoidance and minimization measures shall be reported in the Monthly Compliance Reports prepared by the Designated Botanist. Within 30 days after completion of Project construction, the Project owner shall

provide to the CPM, for review and approval, in consultation with the BLM State Botanist, a written construction termination report identifying how measures have been completed.

The Project owner shall submit a monitoring report every year for the life of the project to monitor effectiveness of protection measures for all avoided special status plants to the CPM and BLM State Botanist. The monitoring report shall include: dates of worker awareness training sessions and attendees, completed

CNDDB field forms for each avoided occurrence on-site and within 100 feet of the Project boundary off-site, and description of the remedial action, if warrantee and planned for the upcoming year. The completed forms shall include an inventory of the special-status plant occurrences and description of the habitat conditions, an indication of population and habitat quality trends.

Response:

The Designated Botanist, Alice Karl, will submit an annual report to the Genesis Staff to be included in the annual report for the CEC.

Genesis Solar Energy Project

Summary Report for Botanical Measures and Issues
Year 2014

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GENESIS SOLAR ENERGY PROJECT
SUMMARY REPORT FOR BOTANICAL MEASURES AND ISSUES
YEAR 2014

1.0 INTRODUCTION

The Genesis Solar Energy Project (GSEP or Project) began construction in January 2011 and became fully operational in Spring 2014. Condition of Certification (COC) BIO-19 from the Project license[1], the approved Project Revegetation Plan[2], the Weed Management Plan[3], and the U.S. Bureau of Land Management (BLM) Right-of-Way (ROW) Grant[4] require that several conservation measures be completed during Project construction and operation to protect and minimize impacts to special-status plant populations and natural vegetation communities and processes. These measures occur during various Project phases, from pre-construction through operation (Table 1). Those associated with all activities completed in 2014 are described herein.

TABLE 1. Measures associated with special-status plant species protection and the revegetation program that were relevant to 2014 and project operations.

CONSTRUCTION PHASE AND SCHEDULE OF COMPLETION	CONSERVATION MEASURE OR TASK	ASSOCIATED COC, ROD, OR PLAN REQUIREMENT
Construction	Weekly monitoring of ESAs during construction activities on access road	BIO-19
Construction and Operations	Monitor and manage weed populations in disturbed areas (outside the fenced site)	BIO-14 and the Weed Management Plan
Post-Construction	Revegetate road shoulders and temporary access roads (south side only, at this point)	BIO-24 and the Revegetation Plan
Operations	Monitor revegetation success based on perennial growth and habitat functioning, Years 2, 3, 4, 5, 10	BIO-24 and the Revegetation Plan

[1] California Energy Commission (CEC). 2010. Commission decision on the Genesis Solar Energy Project. Docket No.09-AFC-8. 710 pp.
[2] Karl, A. and TetraTech EC, Inc. 2010. Revegetation Plan for the Genesis Solar Energy Project. Prepared for Genesis Solar, LLC. 21 pp.
[3] TetraTech EC, Inc. 2011. Weed Management Plan for the Genesis Solar Energy Project. Prepared for Genesis Solar, LLC. 48 pp.
[4] U.S. Bureau of Land Management. 2010. Genesis Solar Energy Project Right-of-Way Lease/Grant. CACA-048880.

CONSTRUCTION PHASE AND SCHEDULE OF COMPLETION	CONSERVATION MEASURE OR TASK	ASSOCIATED COC, ROD, OR PLAN REQUIREMENT
All Project Phases	Monthly and annual compliance reports (monthly during active construction in ESA areas only)	BIO-19

2.0 SUMMARY OF CONSERVATION MEASURES COMPLETED IN 2014

2.1 Environmentally Sensitive Areas (ESAs)

During any construction on the access road, ESAs were inspected weekly by the Designated Botanists or trained monitors working for the Designated Biologist. ESA boundaries have been consistently respected and no damage to signs or habitat inside the ESAs has occurred.

2.2 Revegetation Activities

2.2.1 Salvaged Cactus

Originally, 37 silver cholla (*Cylindropuntia echinocarpa*), 3 pencil cholla (*C. ramosissima*) and 5 fishhook cactus (*Mammillaria tetrancistra*) were excavated and removed from the solar plant site prior to the site being mowed. They were planted along the access road, generally in groups of a few individuals. Plants were watered the first year due to an extended drought.

Not including plants buried by blowsand or destroyed during construction, survival was relatively high for silver cholla, despite the drought conditions (Table 2). The other two species had very low sample sizes, but fishhook cactus appeared to survive well. This high survival is somewhat surprising, given that very few cacti grew along the access road naturally. Further, sand drifting over the plants was a continual problem for some plants and wind exposed the roots of some plants on a regular basis.

TABLE 2. Survival of transplanted cacti.

Species	# Transplanted	Alive	Dead	% Survival	Buried by Blowsand	Gone (destroyed during construction)
Silver Cholla	37	18	4	89.2	6	9
Pencil Cholla	3	2	1	66.6	-	-
Fishhook Cactus	5	3	-	0	2	-

2.2.2 Revegetation and Restoration

Restoration of temporarily disturbed areas outside the fenced power plant includes the access road shoulders, the 230 kV transmission line tower pads and pulling sites, and minor early access areas. The turnarounds along the access road will be kept to provide places for personnel and delivery trucks to pull off the access road without disturbing the restored road shoulders.

Access Road

Restoration proceeded in phases at GSEP because of phased construction. After the access road was paved in 2011, the southern (western) disturbed road shoulder was contoured and seeded in Fall 2011 because no work was planned for that side of the road except for the future 230 kV transmission line. Construction of the latter was anticipated to only involve disturbance at tower pad locations. Unfortunately, no winter precipitation fell during the next winter, resulting in negligible germination. Watering by water trucks was unsuccessful, most likely due to the type of application. It was likely that little of the planted seed remained, as it was very likely blown away, washed away in the monsoonal floods in July 2012, or was consumed by granivores during this year. (See Karl 2013 for a detailed description of the revegetation techniques employed and a discussion of the poor success[5].)

The 230 kV transmission line was constructed along the southern (western) access road beginning in January 2013. While Genesis Solar, LLC, minimized additional disturbance to native habitats outside the road shoulder during the pole construction, the pole height and short distance between the poles resulted in substantial disturbance to the already-restored road shoulder. As a result, revegetation activities began anew in Fall 2013. Taking advantage of my observations that substantial microtopography, such as dirt berms and cobbles, could result in enhanced sites for germination by backing up water and capturing seed and sediment, I experimented using a box scraper to create a series of swales in several locations. These varied in shape and size (Figure 1) but attended to the level and type of water flow in those locations. The swales were seeded with mixture of the following species, with the specific mix varying by location:

Ambrosia dumosa (white bursage)
Ambrosia salsola (cheesebush)
Atriplex polycarpa (allscale)
Encelia farinosa (brittlebush)
Pleuraphis rigida (big galleta grass)
Lupinus arizonicus (Arizona lupine)
Sphaeralcea angustifolia (globemallow)

[5] Karl, A. 2013. Genesis Solar Energy Project summary report for botanical measures and issues associated with pre-construction and construction to January 2013. Prepared for Genesis Solar, LLC, and the California Energy Commission. 46 pp.

The seed was broadcast with a hand-seeder and manually raked in. This was immediately followed by watering with the water truck to crust the soil surface and minimize loss of seed and soil to wind. Comstock Seed (Gardnerville, Nevada), who was previously approved by BLM[6] for the initial seed collection in 2011, provided the seed. They collected it locally in Spring 2013, primarily in the Bradshaw Trail area south of the site. The seed was tested for germination before delivery. Seed remaining from the 2011 revegetation effort was also used.

FIGURE 1 – Swales created to capture moisture, sediment and seed on the southern access road shoulder.

Figure 1a.

[6] E-mail from Larry LaPre, BLM California Desert District Wildlife Biologist, to Christina Lund, BLM State Botanist. April 25, 2011.

Figure 1b.

Figure 1c.

In 2014 and after much debate, Genesis Solar, LLC, decided to leave the wooden pole distribution line in place in the northern (eastern) road shoulder. Restoration of this side of the road originally had been postponed until after the poles were removed. After the decision to leave the poles in place, restoration began in March 2014. Based on the very successful experimental techniques employed the previous fall (see *Revegetation Success*, below), we used a gannon to first rip the compacted road shoulder to approximately 8", then pull and spread the topsoil windrow back onto the shoulder, and finally create a very roughened surface of swales, depressions and furrows (Figure 2). These microtopographical features were attendant to hydrology and soil types, and also were varied to create a more natural, less systematic, outcome. We also created more swales and roughened areas on the southern shoulder and ripped the pole pads. Cobble riprap was placed in two locations where runoff across the road tended to be high and the road shoulder repeatedly washed out. No seeding was implemented on either shoulder because seeding is best accomplished in autumn[7].

FIGURE 2 – Restoration on the access road shoulders in March 2014.

Figure 2a. The gannon spreading the topsoil berm over the ripped, decompacted shoulder

[7] Project management wanted to finish all construction activities in Spring 2014, requiring road restoration to be completed in spring, rather than in fall, when seed could be planted.

Figure 2b. Another type of swale/berm configuration.

Figure 2c. Surface roughening to create sediment and moisture traps.

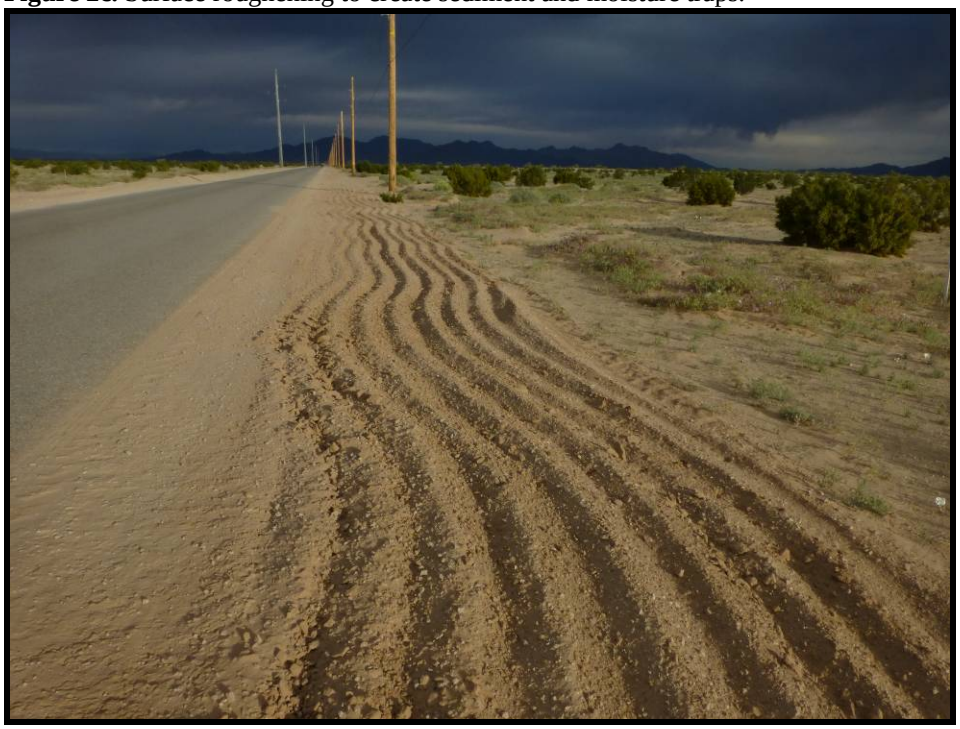


Figure 2d. Cobble riprap to protect the road shoulder and slow flow in high- flow drainages.

Tower Pads from Wiley Well Rest Area to the Colorado River Substation (i.e., Beyond the Access Road).

Along most of the transmission line alignment, surface disturbance was limited to that around pole pads and stringing/pulling sites. A road was not graded for access for most of the alignment and vehicle damage was generally low, with minimal compaction. Each pad and disturbed area was individually evaluated to determine the best method for restoration, which was monitored by trained biological monitors in Spring 2014.

The dunes will restore naturally. It was highly likely that greater damage would likely result from restoration activities than had occurred from the transmission line construction. Accordingly, the tower pads in the dunes were not restored. For tower pads and pulling sites outside the dunes, restoration was limited to recontouring and shallow ripping. Re-contouring was implemented where restoration of natural drainage was necessary.

Seeding was not implemented because the tower pads comprised small patches of disturbance in generally depauperate habitat.

Revegetation Success

The creation of surface roughness and swales in Fall 2013 to retain moisture and collect seed and sediment resulted in high revegetation success along the southern road shoulder. While a few individuals of native shrubs had grown in response to winter rains the previous year, the enhanced microtopography appeared to engender a much higher response. It also included the specific colonizers and annuals that were in the seed mix, all of which are present locally, but not nearly in the abundance observed in the restored areas. Growth of other native annuals was also high and together with the perennials will promote a functioning community. Figure 3 shows representative photographs taken in October 2014.

FIGURE 3 – Revegetation success on the access road, October 2014.

Figure 3a. High growth of seeded shrub species in created berms and swales.

Figure 3b. Another example of high growth of seeded shrub species in a long, linear swale.

Figure 3c. Another example of high growth of seeded shrub species in created berms and swales. The berms and swales nearer the road were created in March 2014, as compared to the more vegetated swales created in Fall 2013.

Figure 3d. Good growth of *Ambrosia salsola* in an area of high water flow.

2.3 Weed Management

The primary noxious weeds at the site are *Brassica tournefortii* (Sahara mustard) and *Salsola tragus* (Russian thistle); *Sisymbrium* spp. (e.g., London rocket) is occasional. While most are winter annuals (i.e., they germinate in response to winter rains), *Brassica* has been observed to respond to large summer rains as well. Brassica also germinates and grows earlier than Salsola, and may have additional germination following late winter rains. Accordingly, at least one and sometimes two weeding sessions are generally necessary, one in early February and potentially one in late March to early April. In 2014, weeding occurred on 3-4 February. Additional plants were weeded in mid-March. In all cases, weed growth was monitored to ensure that weed removal occurred when they were still in the vegetative or bud stage, prior to their setting seed. Weeds were hand-pulled or hoed and if any seeds or pods were present, were bagged and disposed of in the onsite project dumpster.

3.0 SUMMARY AND RECOMMENDATIONS

BIO-14 and the Project Weed Management Plan

Weed monitoring and control has been ongoing and successful.

BIO-19 A.2a and A.2b

ESAs have been established both in the field and in engineering drawings, and well marked in the field. Minimization measures and generous, conservation-oriented staking of ESAs have ensured that ESAs outside the Project ROW are unaffected and those inside the ROW are minimally affected. Careful monitoring of all construction activities on the access road has maintained the integrity of all ESAs.

BIO-24 and the Project Revegetation Plan

Cactus Salvage

This has been moderately successful, despite that no cactus grew in the transplantation area (access road). Artificial monthly watering was needed the first year due to negligible rainfall for almost a year. While this kept most plants alive, only a few were robust during this artificial watering period. The late July 2012 storm resulted in substantial growth and photosynthesis. This suggests that monthly watering may be adequate, but that mulch or a several-day period of wet soil is needed and could benefit the transplantation program if there is a long period of poor to negligible rainfall.

Several plants were in poor health at transplanting. Although *Cylindropuntias* are generally easy to root and grow, success is optimized if transplanted plants are healthy at the time of transplantation. This is likely to assist them especially during periods of drought.

Revegetation Success

Revegetation is, at this point, very successful on the south side of the access road due to enhanced techniques for germination. Per the revegetation plan, quantitative measurements to assess success will be conducted beginning in Year 2 (2015 on the south side, 2016 on the north).

BIO-21 - *EVAPORATION POND NETTING AND MONITORING*

Verification: No less than 30 days prior to operation of the evaporation ponds the project owner shall provide to the CPM as-built drawings and photographs of the ponds indicating that the bird exclusion netting has been installed. For the first year of operation the Designated Biologist shall submit quarterly reports to the CPM, CDFG, and USFWS describing the dates, durations and results of site visits conducted at the evaporation ponds. Thereafter the Designated Biologist shall submit annual monitoring reports with this information. The quarterly and annual reports shall fully describe any bird or wildlife death or entanglements detected during the site visits or at any other time, and shall describe actions taken to remedy these problems. The annual report shall be submitted to the CPM, CDFG, and USFWS no later than January 31st of every year for the life of the project.

Specimen Number *	How to Use the Search Box: You may either start typing your choice or click on the arrow on the right hand side of the search bar to view all choices. Once you locate the appropriate choice, you can highlight the text and then hold down the CTRL button while pressing C on your SPECIES COMMON NAME SEARCH BOX: Species Common Name (AOU English Name) *	Discovery Date *	Name of individual discovering injury/mortality	Condition of Bird/Carcass (or if Active Nest Relocation, please indicate that here)*	Transect/Subplot Number *	Where found: GPS Latitude (decimal degrees)*	Where found: GPS Longitude (decimel degrees)*	Habitat surrounding carcass	Project feature where injured bird/carcass was found*	Project feature where injured bird/carcass was found* (use if more than one feature found)	Additional Information and Notes (Band information, other identifying numbers, mitigating conditions)
N/A	Pigeons & Doves	1/9/2014	Eric German	Dead, fresh (eyes moist)	N/A	33.66582	-114.99642	Other (note)	Project Building	N/A	Found in access road. Seen alive earlier in day. Rock dove found in access road to unit 1 power block, bird removed from access road by worker to prevent further damage to carcass. Collected at trailer and trailer coordinates used for reporting Band AU 2011 ARPU 79363. 1450 left message of mortality.
N/A	Rock Wren	1/13/2014	Eric German	Broken up	N/A	33.65419	-114.97412	Bare Ground	Fencing	Transmission Tower	2nd ROWR carcass about 5 meters to east at 33.65414, -114.97407. Both mortalities in former laydown of piping.
N/A	Rock Wren	1/13/2014	Eric German	Broken up	N/A	33.65414	-114.97407	Bare Ground	Fencing	Transmission Tower	Both mortalities in former laydown of piping.
N/A	American Kestrel	1/29/2014	Eric German	Broken up	N/A	33.65588	-114.98087	Bare Ground	Solar Trough	Other	Partial carcass, tail and feet. Other remains not found. Located beneath solar trough in small amount of vegetation surrounded by bare ground. 4 feet NE of caisson. Carcass likely to have been predated upon.
N/A	Ruddy Duck	2/11/2014	Andrew Fisher	Alive, sick	N/A	33.66919	-114.99774	Other (note)	Evaporation Pond	N/A	Duck observed on netting at 0635, at 1100 duck was on edge of netting and retrievable, duck collected and taken to Blythe rehabilitation center, duck appeared to be uninjured but dehydrated.
N/A	White-Throated Swift	2/13/2014	Ron Walker	Dead, fresh (eyes moist)	N/A	33.67097	-114.99803	Other (note)	Evaporation Pond	N/A	Small unidentified bird found floating in NW corner of the north evaporation pond. Bird was approximately 8 feet from edge of pond and not retrievable. Bird was size of a swallow or swift and dark overall color with a white rump patch. Bird was later identified as white-throated swift.
N/A	Unknown	2/19/2014	Ron Walker	Broken up	Unit 2 block 9 row 16	33.65737	-114.98177	Bare Ground	Other	N/A	In mirror trough field on bare ground, a small wing joint was found under edge of mirror array, approximately 9 feet away from edge of mirror. Unknown small bird species. No other bird parts found.

N/A	Unknown	2/19/2014	Eric German	Articulated skeletal	Unit 2 block 8 row 55	33.65956	-114.97445	Bare Ground	Other	N/A	Bird wing joint found on bare ground between mirror arrays, several primary feathers attached, desiccated, bone exposed, primaries 5-6 inches long faded from sun. No other bird parts found.
N/A	Eurasion Collared Dove	3/18/2014	Eric German	Broken up	Unit 2 block 3 row 8	33.66106	-114.98595	Graded	Solar Trough	Other	Eurasian Collared-Dove. Bird was desiccated and found blowing in the wind within a solar field, beneath solar trough. Contacted USFWS at 1100 and placed in freezer.
N/A	Lincoln's Sparrow	3/20/2014	Eric German	Alive, injured	N/A	33.66459	-114.99696	Other (note)	Water Treatment Building	N/A	The bird was found within the water treatment building. Site personnel reported. Biologist brought to rehab. The feathers were trimmed and the bird appears to be recovering. The bird was stuck on rat sticky paper with stuck crickets. Contacted USFWS LE.
N/A	Mourning Dove	4/10/2014	Ron Walker	Dead, fresh (eyes moist)	N/A	33.66925	-114.99757	Graded	Evaporation Pond	N/A	Mourning dove mortality on ground next to net of the middle portion of south boundary net fence of southern evap pond, bird on side of netting, carcass fresh and intact, 25 feet from waters edge.
N/A	Common Loon	4/14/2014	Ron Walker	Dead, semi-fresh (eyes desiccated, rigor mortis)	N/A	33.66925	-114.99695	Other (note)	Evaporation Pond	N/A	Adult male Common loon found dead on top of netting that covers the south evaporation pond. Approximately 10 feet above water surface. Bird left in place, unable to retrieve carcass. USFWS notified of mortality on 4/14/14.
	Unknown	5/5/2014		Mummified	South Evap pond			Water	Evap ponds	N/A	
1407221330	Brown-Headed Cowbird	7/22/2014	Adam Dobrzanski	Broken up	Between N&S ponds			Gravel	Solar Field	N/A	20144848 Found between North and South ponds
1407221331	American Avocet	7/22/2014	Mosley	Dead, fresh (eyes moist)		33.66459	-114.99696	Dirt	Solar Field	N/A	20144847 Unit 1 solar field
1407231013	Brown-Headed Cowbird	7/23/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Solar Field	Unit 1 Power Block	20144699 - Power Block Unit
1407250913	Unknown	7/25/2014	Mosley	Mummified					Solar Field	N/A	20414844- Unit 1
1407250914	Least Sandpiper	7/25/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Solar Field	N/A	20144824 - Unit 2 power block
1407291000	Brown-Headed Cowbird	7/29/2014	Willis	Dead, semi-fresh (eyes desiccated, rigor mortis)					Power block Unit 2	N/A	Power Block Unit 2
1407310730	Brown-Headed Cowbird	7/31/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Admin bldg	N/A	Admin Building

1407310731	Brown-Headed Cowbird	7/31/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Admin bldg	N/A	20144710-Unit 1 solar field
1407310830	Brown-Headed Cowbird	7/31/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Admin bldg	Power Block	20144699-Unit 1 power block
20144838	Brown-Headed Cowbird	7/31/2014	Mosley	Dead, semi-fresh (eyes desiccated, rigor mortis)					Admin bldg	Admin Area	20144838 -Found in admin area
1407311338	Unknown	7/31/2014	MILONE	Broken up					Solar Field	Solar Trough	20144847 - partial carcass found in Unit 1 solar field
140731	Killdeer	7/31/2014	MILONE	Dead, semi-fresh (eyes desiccated, rigor mortis)					Solar Field	N/A	20144848 - Found in Unit 2 Solar Field
073114-007	Unknown	7/31/2014	MILONE	Dead, semi-fresh (eyes desiccated, rigor mortis)					Evaporation Pond	N/A	
080114-001	Cowbird	8/1/2014	Fortin	Intact and fresh		33.665009	-114.998417		Parking Lot	N/A	33.6650090-0114.998417
080114-002	Cowbird	8/1/2014	Fortin	Intact and fresh		33.665009	-114.998417		Parking Lot	N/A	33.6650090-0114.998417
080114-003	Sparrow	8/1/2014	Wilson	Intact					Unit 1 power block	N/A	
080114-004	Sparrow	8/1/2014	Milone	intact					Unit 2 solar field	N/A	
080114-005	Sea Gull	8/1/2014	Milone	Head and wings					Unit 2 solar field	N/A	
080114-006	Lincoln sparrow	8/1/2014	Mark Nadeau	intact					Water treatment area near sump	N/A	
080414-001	Brown headed cowbird	8/4/2014	Wilson	intact					power block	N/A	
082814-001	Lincoln Sparrow	8/28/2014	Nadeau	intact					Unit 1 solar field	N/A	
090314-001	Mourning Dove	9/3/2014	Milone	intact						N/A	
91820141617	Raven	9/18/2014	Goguts	intact		33.6699	-114.99804		Evaporative ponds	Ponds	
10122014-001	Western Grebe	10/12/2014	Nelson	Intact					Power Block 2 DA deck	N/A	
10132014-S001	Duck	10/13/2014	Bistline	Intact		33.67015304	-114.9963635	In pond muck	North Pond	N/A	
10132014-001	black bird	10/13/2014	Bistline	Whole, in water		33.6701534	-114.9963635	In water	North Pond	N/A	
101314-002	Grebe	10/13/2014	Bistline	Whole		33.67015304	-114.9963635	in water	North Pond	N/A	
101314-003	Grebe	10/13/2014	Bistline	Whole		33.67015304	-114.9966345	in muck	North Pond	N/A	

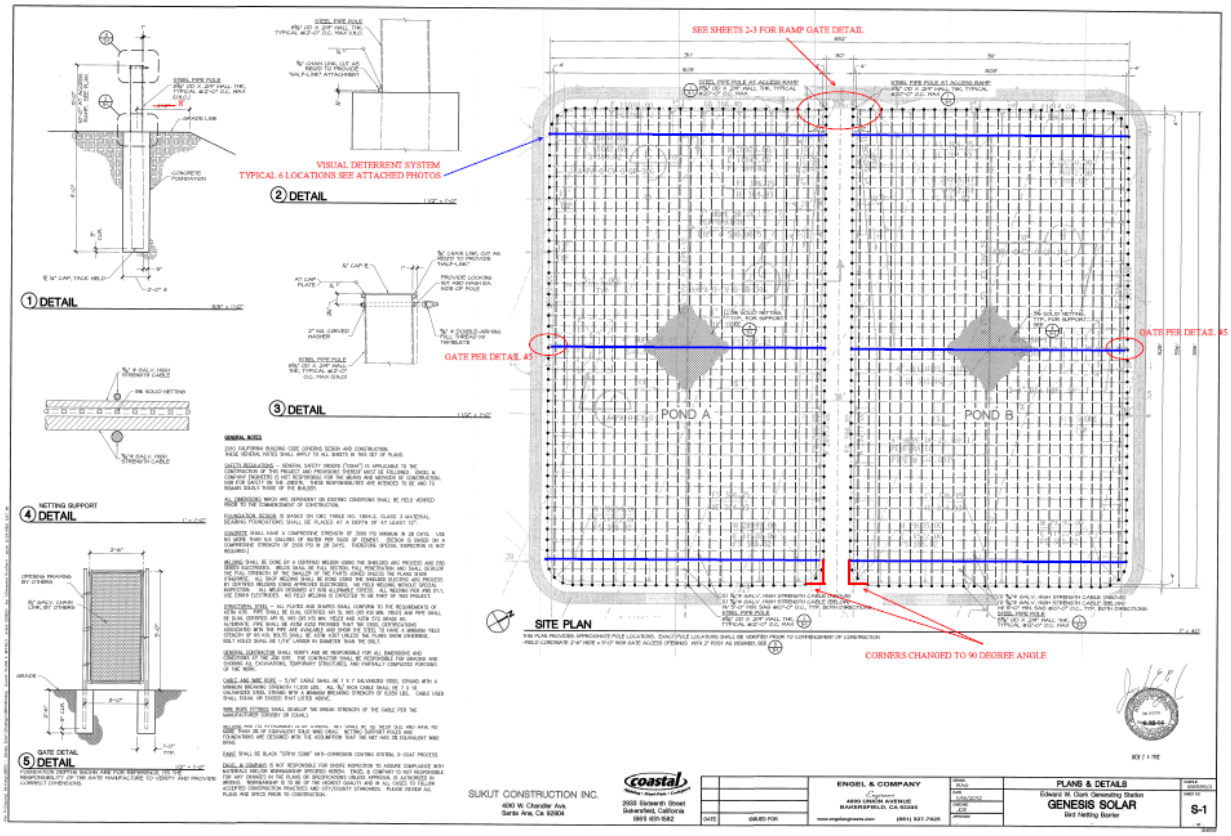
101314-004	Grebe	10/13/2014	Bistline	Whole		33.67015304	-114.9963635	in muck	North Pond	N/A	
101314-005	Duck	10/13/2014	Bistline	Whole		33.67015304	-114.9963645	in muck	North Pond	N/A	
101314-006	Unknown	10/13/2014	Bistline	whole		33.67015304	-114.9963645	in muck	North Pond	N/A	
101314-007	Unknown	10/13/2014	Bistline	whole, old		33.67015304	-114.9963635	water	North Pond	N/A	
101314-008	Black-necked Stilt	10/13/2014	Bistline	whole		33.67015304	-114.9963635	water	North Pond	N/A	
101314-009	duck	10/13/2014	Bistline	whole		33.67010201	-114.9963854	water	North Pond	N/A	
101314-010	duck	10/13/2014	Bistline	whole		33.67010201	-114.9963854	water	North Pond	N/A	
101314-011	duck	10/13/2014	Bistline	whole		33.67012176	-114.9967869	water	North Pond	N/A	
101314-012	American Avocet	10/13/2014	Bistline	whole		33.6701147	-114.9968092	water	North Pond	N/A	
101314-013	Coot? Unknown	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014a	1st of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014b	2nd of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014c	3rd of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014d	4th of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-014e	5th of 5 Ducks	10/13/2014	Bistline	whole		33.67016942	-114.9965858	water	North Pond	N/A	
101314-018	Grebe	10/13/2014	Bistline	whole		33.67082956	-114.9977046	water	North Pond	N/A	
101314-019	duck	10/13/2014	Bistline	whole		33.67082956	-114.9977046	water	North Pond	N/A	
101314-020	Unknown	10/13/2014	Bistline	whole		33.67015304	-114.9963635	water	North Pond	N/A	
101314-021	Unknown	10/13/2014	Bistline	whole		33.67015304	-114.9963635	water	North Pond	N/A	
101314-021	Unknown	10/13/2014	Bistline	whole		33.67016943	-114.9965858	water	North Pond	N/A	
101314-022	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-023	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-024	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	

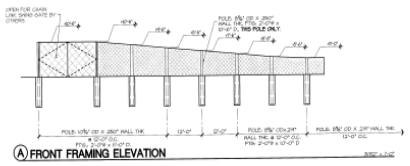
101314-025	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-026	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-027	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101414-002	Unknown	10/13/2014	German	intact				water	North Pond	N/A	
101414-001	Unknown	10/13/2014	German	intact				water	North Pond	N/A	
101314-S001a	1st of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S001b	2nd of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S001c	3rd of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S001d	4th of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S001e	5th of 5 Unknown dead birds	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S002	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S003	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S004	Unknown		Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S005	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S006	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S007	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101314-S010	Unknown	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101414-S001	Unknown	10/14/2014	German	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101514-S001a	1st of 4 dead birds (previously reported)	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101514-S001b	2nd of 4 dead birds (previously reported)	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101514-S001c	3rd of 4 dead birds (previously reported)	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101514-S001d	4th of 4 dead birds (previously reported)	10/13/2014	Bistline	intact		33.67016943	-114.9965858	water	North Pond	N/A	
101614-IS001	American Coot	10/16/2014	Mosley	Alive, Injured	N/A	33.4012.1	-114.59504	Water	South Pond	NW corner	Taken to rehab and released
101814-001	Ruddy duck	10/18/2014	German	intact		33.40154	-114.59525	pond sludge	North Pond	N/A	
101814-002	Eared Grebe	10/20/2014	German	intact		33.40154	-114.59525	pond sludge	North Pond	N/A	
101814-003	Eared Grebe	10/20/2014	German	intact		33.40154	-114.59525	pond sludge	North Pond	N/A	

101814-004	Small swallow	10/20/2014	German	intact		33.40154	-114.59525	pond sludge	North Pond	N/A	
101814-S001	Eared Grebe	10/20/2014	German	Found floating in south pond		685612	11S3727363	water	South Pond	N/A	
101914-IS001	Eared Grebe	10/19/2014	German	Alive, distressed	N/A	33.40123	-114.59473	water	South Pond	NE corner	Taken to Blythe rehab and released
102014-S001	Pigeon	10/20/2014	German	Submerged in algae		3727368	11S0685641	algae	South Pond	N/A	
102014-S003	Unknown	10/20/2014	German	Submerged in algae				algae	South Pond	N/A	
102014-S002	Head of a bird (heron)	10/20/2014	German	Head (floating)		3727369	11S0685640	water	South Pond	N/A	
102114-IS001	Western Grebe	10/21/2014	Mosley	Alive, distressed	N/A			water	South Pond	north side	Taken to Blythe Rehab center who took it to river and released
102314-S001	Sandpiper	10/23/2014	German	Intact		33.40104	-114.59466	water	South Pond	N/A	
102614-S001	Sandpiper	10/26/2014	German	Intact		33.4012	-114.59502	water	South Pond	N/A	
102714-IS001	Western Grebe	10/27/2014	German	Alive, sick	N/A	33.40094	-114.59465	Water	South Pond	SE corner	Taken to IBR, euthanized by IBR
102814-S001	Eared Grebe	10/28/2014	German	Intact		33.4012	-114.59523	water	South Pond	N/A	
102914-S001	Barn swallow	10/29/2014	German	Head only		33.40115	-114.59466	water	South Pond	N/A	
102914-002	Lark	10/29/2014	Goguts	Intact		33.67108	-114.99666	dirt near frac tanks	Dirt near frac tanks	N/A	
103114-IS001	Eared Grebe	10/30/2014	German	Matted feathers, not buoyant, and had odor	N/A	33.40094	-114.59465	In transport	South Pond	N/A	Died in transport
110114-S001	Unknown	11/1/2014	German	No feathers, eyes or color	N/A	33.340121	-114.59504	Water	South Pond	Bottom of ramp	
110114-S002	Red Necked Phalarope	11/1/2014	German	intact	N/A	33.40111	-114.59466	Water	South Pond	east side	observed earlier in day alive, seen swimming.
110414-S001	Eared Grebe	11/4/2014	German	intact	N/A	33.40096	-114.59501	Water	South Pond	N/A	observed earlier in day alive, seen swimming.
110614-001	Western Grebe	11/6/2014	German	Partially scavenged	N/A	33.40362	-115.0105	dirt, near perimeter fence	Near perimeter fence, Unit 1	N/A	
110714-IS001	Western Grebe	11/7/2014	Mosley	Alive	N/A	33.67016943	-114.9965858	South Pond	South pond	N/A	Taken to IBR
111714-S001	Ruddy Duck	11/17/2014	German	Intact, in water.	N/A	33.40094	-114.59467	South Pond	South Pond	N	Site freezer
111714-S002	Unknown	11/17/2014	German	Disarticulating bones visible	N/A	33.4012	-114.59468	South Pond	South Pond	N/A	Site freezer
120814-N001	Eared Grebe	12/8/2014	Preslar	In tact in water	N/A	33.4012	-114.59467	North Pond	North Pond	N/A	Site freezer
120901-S001	Kildeer	12/9/2014	Preslar	Not in water. On land	N/A	33.40362	-114.99658	on land near south pond	South pond	N/A	Site freezer

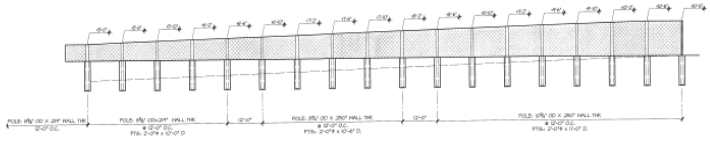
Date	Time of Day	Location	Species	Found By:
2/14/2014	0800 am	North Evap pond in water	White throated Swift	Eric German
2/13/2014	800	South evap pond	Loon removed from netting	Eric German
3/20/2014		North Evap pond	Western Grebe	Eric German
3/20/2014		South Evap pond	Grebe	Eric German
3/25/2014		North Evap pond	Loon dead on top of netting, cannot get to it	Eric German
4/10/2014	742	Evap pond	Morning Dove	Eric German
7/22/2014	1330	between North and south Evap ponds	Brown headed cow bird	plant personnel
7/22/2014	1330	between North and south Evap ponds	Avecet	plant personnel
7/25/2014	913	South pond	Brown headed cow bird	plant personnel
7/25/2014	913	South pond	Finch	plant personnel
7/28/2014	930	South pond	unknown crusted up black bird	plant personnel
8/28/2014	1000	North pond	unknown bird in water.	plant personnel
9/3/2014		Pond netting was destroyed in a wind storm.	No birds in ponds	

Note:
Since the time the netting has been installed we have had instances of entrapment in the ponds. The birds cannot leave the netting and are stuck in the ponds
The birds that were injured in the netting was not documented by the designated biologist.
I called the rehabilitation center and she said most of the injured birds were due to over heating, and of the total amount, 75% of them were rehab'd and released back into the wild.


SEE SHEETS 2-3 FOR RAMP GATE DETAIL
VISUAL DETERRENT SYSTEM
TYPICAL 6 LOCATIONS SEE ATTACHED PHOTOS
GATE PER DETAIL #5
GATE PER DETAIL #5
POND A
POND B
CORNERS CHANGED TO 90 DEGREE ANGLE
1 DETAIL
2 DETAIL
3 DETAIL
4 DETAIL
5 DETAIL
SITE PLAN
SUKUT CONSTRUCTION INC.
400 W. Chandler Ave.
Santa Ana, Ca 92804
coastal
2668 Sixteenth Street
Bakersfield, California
(661) 631-5142
ENGEL & COMPANY
4695 UNION AVENUE
BAKERSFIELD, CA. 93305
(661) 327-7926
PLANS & DETAILS
Edward W. Clark Generating Station
GENESIS SOLAR
Bird Netting Barrier
S-1



A FRONT FRAMING ELEVATION



B SIDE FRAMING ELEVATION

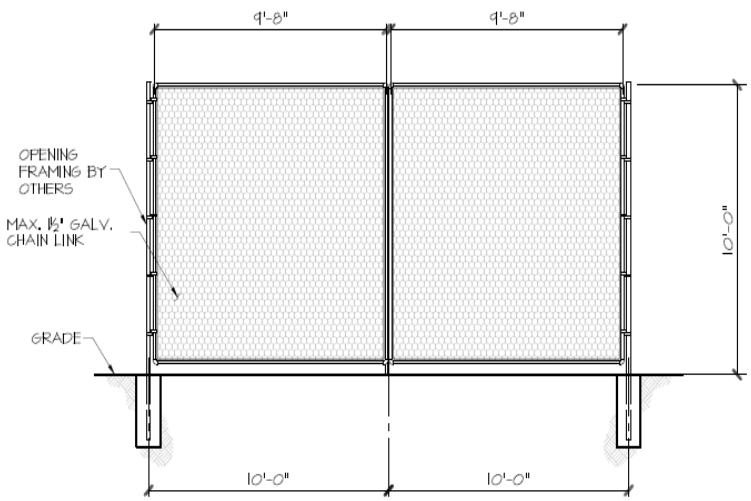
SUKUT CONSTRUCTION INC.
4010 W. Chandler Ave.
Santa Ana, Ca. 92704

coastal
2959 Sixteenth Street
Bakersfield, California
(661) 633-1662

ENGEL & COMPANY
4009 UNION AVENUE
BAKERSFIELD, CA 93305
www.engelengineers.com (661) 327-7605

DETAILS
Edward W. Clark Generating Station
GENESIS SOLAR
Bird Netting Barrier

S-2


4'-8"
4'-8"
OPENING FRAMING BY OTHERS
MAX. 1½" GALV. CHAIN LINK
GRADE
10'-0"
10'-0"
10'-0"

BIO-22 - *MITIGATION FOR IMPACTS TO STATE WATERS*

Verification: No less than 30 days prior to the start of construction-related ground disturbance activities potentially affecting waters of the state, the Project owner shall provide written verification (i.e., through incorporation into the (BRMIMP) to the CPM that the above best management practices shall be implemented. The Project owner shall also provide a discussion of work in waters of the state in Compliance Reports for the duration of the Project.

No less than 30 days prior to beginning construction-related ground-disturbing activities the Project owner shall provide written verification of Security in accordance with this condition of certification. The Project owner, or an approved third party, shall complete and provide written verification of the proposed compensation lands acquisition within 18 months of the start of construction related ground-disturbing activities.

The Project owner shall notify the CPM and CDFG, in writing, at least five days prior to initiation of construction-related ground-disturbing activities in jurisdictional state waters and at least five days prior to completion of Project activities in jurisdictional areas. The Project owner shall notify the CPM and CDFG of any change of conditions to the Project, impacts to state waters, or the mitigation efforts. The notifying report shall be provided to the CPM and CDFG no later than seven days after the change of conditions is identified. As used here, change of condition refers to the process, procedures, and methods of operation of a Project; the biological and physical characteristics of a Project area; or the laws or regulations pertinent to the Project as defined below. A copy of the notifying Change of Conditions report shall be included in the annual reports or until it is deemed unnecessary by the CPM, in consultation with CDFG.

The Project owner, or an approved third party, shall provide the CPM, CDFG and USFWS with a draft management plan for the compensation lands and associated funds within 180 days of the land or easement purchase, as determined by the date on the title. The CPM shall review and approve the management plan, in consultation with CDFG.

Within 90 days after completion of Project construction, the Project owner shall provide to the CPM and CDFG an analysis with the final accounting of the amount of jurisdictional state waters disturbed during Project construction.

The Project owner shall provide written verification to the CPM, USFWS and CDFG that the compensation lands or conservation easements have been acquired and recorded in favor of the approved recipient no later than 18 months after the start of construction-related ground-disturbing activities.

On January 31st of each year following construction the Designated Biologist shall provide a report to the CPM, BLM, USFWS and CDFG that describes the results of

monitoring and management of the acquisition lands. The annual report shall describe actions taken to implement the management plan (for example, fencing, erosion control, weed control) during the year and recommendations for enhancement actions that should be implemented the following year.

Response:

Wildlands will be responsible for completing the other compensatory mitigation tasks and deliverables described in the CEC Decision and BLM Approvals, including, but not limited to, Preliminary Report, Title/Conveyance, Initial Protection and Habitat Improvement, Property Analysis Record, and Long-Term Maintenance and Management Funding and all associated reports and notifications that must be submitted to the Approving Agencies.

NEXTera® ENERGY RESOURCES

September 19, 2011

Mr. Eric Veerkamp
Compliance Project Manager
California Energy Commission
1516 Ninth Street
Sacramento, CA 95814

RE: Genesis Solar Energy Project (09-AFC-8)
Condition of Certification BIO-12, BIO-18, BIO-20, BIO-22
Mitigation Land Acquisition Proposal

Dear Mr. Veerkamp:

Enclosed please find the supplemental information for interim habitat management improvement fund, long term management, and PAR sections of the mitigation land acquisition proposal for the compensation lands for the Genesis Solar Energy Project. These materials are being submitted to you in compliance with the following Conditions of Certification; BIO-12, BIO-18, BIO-20 and BIO-22. These conditions were set forth by the California Energy Commission's Final Decision in October of 2010.

Very truly yours,

T. Higdon

Timothy Higdon
Compliance Manager
Genesis Solar, LLC
135 N. Commercial
Blythe, California 92225

AGREEMENT FOR PURCHASE AND SALE OF MITIGATION VALUES
(Genesis Solar Energy Project)

This Agreement for Purchase and Sale of Mitigation Values ("**Agreement**"), dated for reference purposes only as December 22, 2010, is entered into by and between **WILDLANDS CALIFORNIA HOLDINGS, LLC**, a California limited liability company ("**Wildlands**"), and **GENESIS SOLAR, LLC,** a Delaware limited liability company (**"Genesis Solar"**). Wildlands and Genesis Solar are collectively referred to herein as the **"Parties."**

Recitals

A. Genesis Solar's Project. Genesis Solar is a developer of solar thermal plants, and is undertaking the development of a solar electric generating facility using solar parabolic trough technology with a generating capacity of 250 megawatts (the **"Project"**). The Project is located approximately twenty-five (25) miles west of the City of Blythe, in Riverside County, California, primarily on lands managed by the Bureau of Land Management (**"BLM"**).

B. Project Approvals. As a part of the approval process for the Project, Genesis Solar must obtain certain approvals and certifications from the BLM and the California Energy Commission ("**CEC**"). In November 2009, Genesis Solar filed an "Application for Transportation and Utility Systems and Facilities on Federal Lands" with BLM for the purpose of constructing, operating and maintaining the Project. In August 2009, Genesis Solar filed an Application for Certification with the CEC.

C. CEC Decision. On or about September 29, 2010, the CEC issued its decision (CEC Decision CEC- 800-2010-011 CMF) (the **"CEC Decision"**) approving Genesis Solar's Application for Certification subject to the Conditions of Certification (**" CEC Conditions of Certification"**) set forth therein. The CEC Conditions of Certification identified the impacts that the Project may have on certain species and habitat, including, without limitation, the Desert Tortoise (Gopherus agassizii), the Mojave fringe-toed lizard (Uma scoparia), the burrowing owl, Desert Dry Wash Woodland and Waters of the State. The Project impacts identified in the CEC Conditions of Certification and the CEC Compensatory Mitigation Requirements for the Project are more particularly described in BIO conditions 12, 18, 20, 22, and 29 of Exhibit A attached hereto and incorporated herein by reference.

D. Record of Decision, Right of Way Grant and Notice to Proceed. On or about November 3, 2010, BLM issued its Record of Decision (**"ROD"**) for the Project. The ROD, which adopts the CEC Conditions of Certification and Compensatory Mitigation Requirements and incorporates the US Fish and Wildlife Service's (**"USFWS"**) Biological Opinion, identifies the Project impacts and imposes Compensatory Mitigation Requirements on Genesis Solar that are more particularly described in Exhibit B attached hereto and incorporated herein by reference. BLM also issued its Right of Way Grant and Notice to Proceed. The ROD, Right of Way Grant and Notice to Proceed are collectively referred to herein as the **"BLM Approvals."** Copies of the ROD and the Biological Opinion are attached hereto as Exhibit C and Exhibit D, respectively, which are incorporated herein by this reference.

E. Compensation for Project Impacts. The Project impacts identified by the CEC and the BLM are collectively referred to herein as the "**Project Impacts**." CEC Compensatory

Mitigation Requirements and BLM Compensatory Mitigation Requirements described in Exhibits A and B are collectively referred to herein as "**Compensatory Mitigation Requirements.**" Genesis Solar desires to compensate for the Project Impacts by purchasing sufficient suitable Mitigation Values (as hereinafter defined) to offset the Project Impacts.

F. Wildlands' Business. Wildlands is the operator of compensatory mitigation projects for impacts to wetlands, protected species and/or protected habitat, and is in the business of locating properties suitable for mitigating such impacts.

G. Mitigation Property. Wildlands has the contractual right to acquire certain real property, consisting of approximately 2,076± acres, located in close proximity to the Project (the "**Mitigation Property**"). The Mitigation Property is more particularly described in Exhibit E attached hereto and incorporated herein by this reference.

H. Wildlands' Feasibility Activities. Wildlands has undertaken, and will continue to undertake, substantial activities towards determining the feasibility of preserving and managing the habitat values at the Mitigation Property, including, without limitation, performing wildlife surveys and resource mapping, soils reconnaissance to explore habitat restoration potential, cultural resources evaluations and other activities (collectively, "**Feasibility Activities**").

I. Potentially Suitable Mitigation. Based upon the Feasibility Activities conducted by Wildlands to date, the Parties believe that the Mitigation Property may be suitable for mitigating the Project Impacts in satisfaction of Genesis Solar's Compensatory Mitigation Requirements.

J. Management Plans and Other Compensatory Mitigation Requirements. Wildlands intends to prepare and process for approval by the CEC Compliance Project Manager ("**CEC-CPM**"), the California Department of Fish and Game ("**CDFG**"), the BLM and the USFWS (collectively, the "**Approving Agencies**"), a Long-Term Management Plan that addresses and incorporates the relevant compensatory mitigation obligations set forth in the CEC Conditions of Certification, the BLM Approvals and the Biological Opinion issued by the USFWS (a "**Management Plan**") and certain related documents for each of the parcels comprising the Mitigation Property, including, without limitation, a conservation easement for each of the parcels comprising the Mitigation Property, in order to allow the preservation and management of some or all of the habitat on the Mitigation Property. Each Management Plan will include, among other matters, design goals and objectives, descriptions of targeted compensatory habitats, generalized mapping of habitats, water management strategies, long-term vegetation management techniques, and funding mechanisms. Wildlands will also be responsible for completing the other compensatory mitigation tasks and deliverables described in the CEC Decision and BLM Approvals, including, but not limited to, Preliminary Report, Title/Conveyance, Initial Protection and Habitat Improvement, Property Analysis Record, and Long-term Maintenance and Management Funding and all associated reports and notifications that must be submitted to the Approving Agencies.

K. Approval; Creation of Mitigation Values. Wildlands and Genesis Solar intend to thereafter process the Management Plans with the Approving Agencies for the purpose of creating mitigation values ("**Mitigation Values**") that can be used by Genesis Solar to compensate for Genesis Solar's Compensatory Mitigation Requirements. The Mitigation Values

will be deemed to be created and valid at such time as the Parties obtain written approval from all of the Approving Agencies that such Mitigation Values are actually sufficient and suitable to satisfy Genesis Solar's Compensatory Mitigation Requirements described in Exhibits A and B and Wildlands has completed the Property Analysis Recorded (PAR) to the satisfaction of the Approving Agencies (collectively the **"Approval"**).

L. Purchase of Mitigation Values. Pursuant to the terms and conditions of this Agreement, Genesis Solar desires to satisfy its Compensatory Mitigation Requirements by purchasing Mitigation Values from the Mitigation Property upon satisfaction of certain Closing Conditions (as hereinafter defined). Some parcels comprising the Mitigation Property may only be suitable for mitigating one type of the Project Impacts (e.g., Mojave fringe-toed lizard), whereas other parcels comprising the Mitigation Property will be suitable for mitigating multiple Project Impacts (e.g., Desert Tortoise and Waters of the State) (the **"Layered Mitigation Values"**). Genesis Solar strongly desires to purchase Layered Mitigation Values as opposed to purchasing Mitigation Values from parcels that satisfy only one type of Project Impact.

M. Purpose. The purpose of this Agreement is to provide for the purchase and sale of Mitigation Values from the Mitigation Property.

NOW, THEREFORE, in consideration of the foregoing recitals, and the mutual covenants contained herein, the Parties agree as follows:

Agreement

1. Effective Date. For the purposes of this Agreement, the date on which the last party executes this Agreement and delivers it to the other party shall hereinafter be referred to as the **"Effective Date."**

2. Allocation of Mitigation Values. Pursuant to the terms and conditions of this Agreement, Wildlands agrees to sell to Genesis Solar and set aside for the exclusive use of Genesis Solar, and Genesis Solar agrees to purchase from Wildlands, the following-described Mitigation Values from the Mitigation Property (the "**Allocated Mitigation**"):

Impacts Mitigated	Acreage	Cost Per Mitigation Value Acreage (the "Acreage Price")	Total Cost
Desert Tortoise Only	1,740	[redacted]	[redacted]
Desert Tortoise and Microphyllous Woodland	48	[redacted]	[redacted]
Desert Tortoise and Other State Waters	63	[redacted]	[redacted]
Desert Tortoise and Burrowing Owl	39	[redacted]	[redacted]
Mojave Fringe-toed Lizard	136	[redacted]	[redacted]
TOTAL	2,026		[redacted]

(a) Substitution of Mitigation Property. The actual acreage of the parcels comprising the Mitigation Property exceeds the total acreage that is required to satisfy Genesis Solar's Compensatory Mitigation Requirements. Genesis Solar understands and acknowledges that Wildlands is still in the process of conducting its Feasibility Activities with respect to each of the parcels comprising the Mitigation Property to determine whether they are suitable for mitigating the Project Impacts in satisfaction of Genesis Solar's Compensatory Mitigation Requirements, and agrees that Wildlands shall have the right, in its sole and absolute discretion, to substitute different parcels in place of any one or more of the parcels comprising the Mitigation Property, provided that such substituted parcels are suitable for mitigating the Project Impacts and are approved as such by the Approving Agencies pursuant to the provisions of Recital K and Section 8(b).

3. Purchase Price. The purchase price ("**Purchase Price**") for the Allocated Mitigation shall be Seven Million Three Hundred Eighty-Nine Thousand Five Hundred and No/100ths Dollars ($7,389,500.00), which was determined by multiplying the number of acres comprising the Allocated Mitigation by the Acreage Price. The Purchase Price shall be paid by Genesis Solar to Wildlands in accordance with the provisions of Section 4 below.

4. Mitigation Security; Payment of Purchase Price.

(a) Mitigation Security. The CEC Decision and BLM Approvals require Genesis Solar to provide certain financial assurances (in the form of an irrevocable letter of credit, a pledged savings account or another form of security) (**"Mitigation Security"**) to the Approving Agencies to guarantee that an adequate level of funding is available to implement the Compensatory Mitigation Requirements that have not been completed prior to the commencement of ground-disturbing Project activities (the **"Mitigation Security**

Requirement"). The estimated amount of such Mitigation Security is Six Million Six Hundred and Sixty Thousand Four Hundred Twenty-Eight and No100ths Dollars ($6,660,428.00), which is subject to adjustment based upon certain factors (i.e., cost of land, cost of protection and habitat improvement activities and cost of long-term maintenance and management), as more particularly set forth in the CEC Decision.

(b) Establishment of Mitigation Security Escrow Account. In satisfaction of the Mitigation Security Requirement, Genesis Solar will establish one or more escrow accounts (collectively, the **"Mitigation Security Escrow Account"**) with First American Fund Control, Inc. (or such other financial institution or escrow holder that is acceptable to the Approving Agencies) (the **"Mitigation Security Escrow Holder"**) and to deposit into such Mitigation Security Escrow Account an amount sufficient to satisfy the Mitigation Security Requirement. Genesis Solar agrees to establish the Mitigation Security Escrow within thirty (30) calendar days after the Effective Date of this Agreement and to deposit into such Mitigation Security Escrow Account an amount sufficient to satisfy the Mitigation Security Requirement in immediately available funds.

(c) Escrow Instructions. In conjunction with the establishment of the Mitigation Security Escrow Account, Genesis Solar shall execute, and shall cause the Mitigation Security Escrow Holder and the appropriate Approving Agencies to execute, Irrevocable Escrow Instructions (**"Escrow Instructions"**) setting forth the procedures for the operation of the Mitigation Security Escrow Account and for the disbursement of the funds held in the Mitigation Security Escrow Account. The Escrow Instructions, which shall be in a form that is approved by Genesis Solar, the Mitigation Security Escrow Holder, the appropriate Approving Agencies and Wildlands, shall authorize the Mitigation Security Escrow Holder to disburse an amount equal to the Purchase Price to Wildlands upon the Closing (as hereinafter defined) pursuant to the provisions of Sections 5(b) and 6(b) below.

(d) Earnest Money. Within twenty (20) calendar days after the Effective Date of this Agreement, Genesis Solar shall deposit with the Genesis Solar/Wildlands Escrow Holder (as hereinafter defined) the amount of Three Hundred Ninety-One Thousand Nine Hundred Ninety-Five and No/100ths Dollars ($391,995.00), which constitutes five percent (5%) of the Purchase Price (the **"Earnest Money"**). The Earnest Money shall become nonrefundable at such time as the Closing Conditions (as hereinafter defined) are satisfied, and shall be released to Wildlands upon the Close of Escrow. The Earnest Money shall be applied to the Purchase Price. In the event that the Closing Conditions are not satisfied prior to the Outside Closing Date for any reason other than Genesis Solar's default, Wildlands shall instruct the Escrow Holder to immediately refund the Earnest Money to Genesis Solar.

5. Genesis Solar/Wildlands Escrow and Closing.

(a) Opening of Escrow. Within twenty (20) days after the Effective Date of this Agreement, Genesis Solar and Wildlands shall open an escrow (the **"Genesis Solar/Wildlands Escrow"**) with First American Fund Control, Inc., P.O. Box 25619 Santa Ana, California (**"First American"**) for the purpose of holding the Earnest Money and handling the Closing pursuant to Section 5(b) below. All amounts deposited into the Genesis Solar/Wildlands Escrow by Genesis Solar pursuant to this Agreement shall be invested by First American with a financial institution

acceptable to Genesis Solar, in a federally-insured interest-bearing demand account. Any interest thereon shall accrue to the benefit of Genesis Solar.

(b) Closing. For purposes of this Agreement, the **"Closing "** shall be defined as the date on which Wildlands delivers to Genesis Solar a Bill of Sale, which shall be in the form attached hereto as Exhibit F and incorporated herein by this reference. The Closing shall not occur before May 1, 2011 nor before the following conditions (collectively, the **"Closing Conditions"**) have been satisfied:

(i) The Approval has been obtained; and

(ii) A Conservation Easement has been recorded, or is in a position to be recorded concurrently with the Closing, against each of the parcels comprising the Mitigation Property.

The Closing date shall not be later than September 1, 2011 (the **"Outside Closing Date"**). In the event that either of the Closing Conditions have not be satisfied by the Outside Closing Date, Genesis Solar shall have the right to either (i) waive the Closing Conditions, in which event Genesis Solar and Wildlands shall proceed with the Closing by the Outside Closing Date in accordance with the terms and conditions of this Agreement, or (ii) terminate this Agreement, in which event the Earnest Money shall be promptly refunded to Genesis Solar, Wildlands shall have no right to any of the funds held in the Mitigation Security Escrow Account, and the Parties shall have no further rights, duties or obligations under this Agreement.

6. Closing Documents.

(a) Deposits By Wildlands. Prior to the Closing, Wildlands shall deposit with First American the following documents:

(i) Bill of Sale. The Bill of Sale, executed by Wildlands, evidencing the sale of the Allocated Mitigation to Genesis Solar. The Bill of Sale shall be in the form attached hereto as Exhibit F and incorporated herein by this reference.

(ii) Conservation Easements. To the extent that the Conservation Easements have not already been recorded against the parcels comprising the Mitigation Property, Wildlands shall deposit the Conservation Easements, executed and acknowledged by the parties thereto.

(iii) Miscellaneous. Such other documents and instructions as may be reasonably required by the Genesis Solar/Wildlands Escrow Holder or Genesis Solar in order to close the Escrow in accordance with the terms of this Agreement.

(b) Deposits By Genesis Solar. Prior to the Closing, Genesis Solar shall deposit with First American the following documents and funds:

(i) Balance of Purchase Price. Genesis Solar, with approval from the CEC as required in the applicable escrow instructions, shall cause the Mitigation Security Escrow Holder to disburse from the Mitigation Security Escrow Account to First American an amount

equal to the Mitigation Security Requirement in immediately available funds, and all Closing costs and expenses that are required to be paid by Genesis Solar under Section 7 of this Agreement.

(ii) Miscellaneous. Such other documents and instructions as may be reasonably required by the Genesis Solar/Wildlands Escrow Holder or Wildlands in order to close Escrow in accordance with the terms of this Agreement.

7. Costs and Expenses. All fees and costs associated with the Genesis Solar/Wildlands Escrow shall be divided equally between Genesis Solar and Wildlands. Genesis Solar shall be solely responsible for all fees and costs associated with the Mitigation Security Escrow Account. Genesis Solar and Wildlands shall each pay all legal and professional fees and fees of other consultants incurred by Genesis Solar and Wildlands, respectively.

8. Pre-Closing Approvals and Permits.

(a) Analysis and Verification. To the extent they have not already done so, Wildlands' specialists shall review, analyze and verify the biological attributes, soil types and conditions, hydrological resources and other factors to the degree required to submit the Mitigation Property to the Approving Agencies as a suitable location for the Allocated Mitigation.

(b) Draft Management Plans. As soon as reasonably practicable after the Effective Date of this Agreement, Wildlands shall prepare a draft of each Management Plan (collectively, the **"Draft Management Plans"**) and submit them to Genesis Solar for Genesis Solar's review and approval, which approval shall not be unreasonably withheld. The Draft Management Plans shall be consistent with other Management Plans prepared by Wildlands on similar projects. Genesis Solar shall have fifteen (15) days in which to review and approve the Draft Management Plans. Genesis Solar's failure to provide Wildlands with written notice of Genesis Solar's disapproval of the Draft Management Plans within such fifteen (15)-day period shall be deemed to constitute Genesis Solar's approval of the Draft Management Plans. In the event that Genesis Solar disapproves of the Draft Management Plans, Genesis Solar and Wildlands shall use their good faith, commercially reasonable efforts to promptly resolve Genesis Solar's reasonable concerns. If Genesis Solar and Wildlands are unable to resolve Genesis Solar's reasonable concerns regarding the Draft Management Plans, either Party may terminate this Agreement by providing written notice to the other Party, in which event the Earnest Money shall be promptly refunded to Genesis Solar, and the parties shall have no further rights, duties or obligations under this Agreement. Once the Draft Management Plans are approved by Genesis Solar, Wildlands shall process the Draft Management Plans with the Approving Agencies, with the support of Genesis Solar as needed, and shall use its good faith, commercially reasonable efforts to obtain the Approving Agencies' approval of the Draft Management Plans as soon as reasonably practicable. The terms and conditions of the final Management Plans (**"Final Management Plans"**) that are actually approved by the Approving Agencies shall be subject to Wildlands' approval, which may be given or withheld in Wildlands' sole and absolute discretion. Wildlands makes no representations or warranties concerning whether the Draft Management Plans will be approved by the Approving Agencies or concerning the timing for such approval. In no event

shall the Approving Agencies' refusal to approve the Draft Management Plans constitute a default by Wildlands or Genesis Solar under this Agreement.

(c) Conservation Easements. In conjunction with preparing and processing the Draft Management Plans, Wildlands shall prepare a conservation easement (**"Conservation Easement"**) for each parcel comprising the Mitigation Property, and use its good faith, commercially reasonable efforts to obtain the Approving Agencies' approval of the Conservation Easements as soon as reasonably practicable and in conjunction with obtaining the Approving Agencies' approval of the Draft Management Plans. Wildlands shall cause the Conservation Easements to be recorded in the Official Records of Riverside County either concurrently with or prior to the Closing. The terms and conditions of the Conservation Easements shall be subject to Wildlands' approval, which shall not be unreasonably withheld.

(d) Initial Protection and Habitat Improvement. Wildlands shall perform, at its sole cost, any initial protection and habitat improvement activities as required in the CEC Decision and BLM Approvals.

(e) Endowment. As set forth in the Final Management Plans, Wildlands shall establish any and all endowment funds or other security for the monitoring and maintenance of the Mitigation Property in accordance with the requirements of the Final Management Plans.

9. Limitation of Obligations.

(a) Limitation of Obligations. Genesis Solar shall have no obligation whatsoever by reason of the use of the Mitigation Property for the Allocated Mitigation, to support, pay for, monitor, report on, sustain, continue in perpetuity or otherwise be obligated or liable for the success or continued expense or maintenance in perpetuity of the Mitigation Property. As set forth above, Wildlands shall be fully and completely responsible therefore and for satisfying any and all conditions placed on the Mitigation Property in accordance with the relevant Compensatory Mitigation Requirements in the CEC Decision, BLM Approvals and the Final Management Plans. Wildlands agrees to defend, indemnify and hold harmless Genesis Solar, its affiliates, lenders, partners, advisors, investors (including purchasers of all or a portion of the Project) and each of their respective agents, representatives, co-venturers, employees, officers, directors and shareholders from and against all liabilities, claims, damages, costs and expenses, including, but not limited to, reasonable attorneys' fees, arising out of, related to, or resulting from Wildlands' failure to perform its obligations under the Final Management Plans and this Agreement.

(b) Limitation of Rights to Mitigation Property. Nothing in this Agreement shall result in Genesis Solar having any right, title or interest in the Mitigation Property greater than that specifically granted by this Agreement. Genesis Solar's sole right shall be to have the Mitigation Property serve as the required mitigation for the Project if and when the Approving Agencies approve the Allocated Mitigation, and provided that Genesis Solar satisfies all of its obligations under this Agreement.

(c) Joint Use. Upon the Closing and Genesis Solar's delivery of the Purchase Price to Wildlands, Wildlands shall allocate the Allocated Mitigation for the sole use of Genesis Solar,

and shall deliver to Genesis Solar a Bill of Sale, which shall be in the form attached hereto as Exhibit F and incorporated herein by this reference, evidencing the sale of the Allocated Mitigation to Genesis Solar. This reservation shall in no way restrain Wildlands from selling to others any remaining Mitigation Values at the Mitigation Property, so long as the aggregate number of Mitigation Values sold to all parties, including Genesis Solar, from the Mitigation Property, does not exceed the aggregate number of Mitigation Values available at the Mitigation Property.

(d) Project Approvals. Except as otherwise provided herein, Genesis Solar shall be solely responsible for obtaining the BLM Approvals and any remaining approvals from the CEC. In that regard, Wildlands has made and makes no representation, warranty or guaranty that the Approving Agencies will approve the Mitigation Property as suitable mitigation for the Project. Notwithstanding the foregoing provision, Wildlands shall make reasonable efforts to obtain the Approving Agencies' approval of the Final Management Plans and approval of the use of the Allocated Mitigation for Genesis Solar's Project by providing information required by the Approving Agencies and executing documents required by the Approving Agencies.

10. **Default by Genesis Solar; Liquidated Damages. GENESIS SOLAR RECOGNIZES THAT THE ALLOCATED MITIGATION WILL BE REMOVED BY WILDLANDS FROM THE MARKET DURING THE EXISTENCE OF THIS AGREEMENT, AND THAT IF THE CLOSING DOES NOT OCCUR BECAUSE OF GENESIS SOLAR'S DEFAULT, IT WOULD BE EXTREMELY DIFFICULT AND IMPRACTICAL TO ASCERTAIN THE EXTENT OF THE DETRIMENT TO WILDLANDS. THE PARTIES HAVE DETERMINED AND AGREED THAT THE ACTUAL AMOUNT OF DAMAGES THAT WOULD BE SUFFERED BY WILDLANDS AS A RESULT OF ANY SUCH DEFAULT IS DIFFICULT OR IMPRACTICABLE TO DETERMINE AS OF THE DATE OF THIS AGREEMENT AND THAT AN AMOUNT EQUAL TO THE EARNEST MONEY IS A REASONABLE ESTIMATE OF THE AMOUNT OF SUCH DAMAGES. FOR THESE REASONS, THE PARTIES AGREE THAT IF THE CLOSING DOES NOT OCCUR BECAUSE OF GENISIS SOLAR'S DEFAULT, THE EARNEST MONEY SHALL BE FORFEITED TO WILDLANDS AS LIQUIDATED DAMAGES. UPON ANY SUCH UNCURED BREACH OR DEFAULT BY GENESIS SOLAR HEREUNDER, THIS AGREEMENT SHALL BE TERMINATED, AND NEITHER PARTY SHALL HAVE ANY FURTHER RIGHTS OR OBLIGATIONS HEREUNDER, EACH TO THE OTHER , EXCEPT FOR THE RIGHT OF WILDLANDS TO RETAIN THE EARNEST MONEY. DELIVERY TO AND RETENTION OF THE EARNEST MONEY SHALL BE WILDLANDS' SOLE AND EXCLUSIVE REMEDY AGAINST GENESIS SOLAR IN THE EVENT OF A MATERIAL DEFAULT OR BREACH BY GENESIS SOLAR RESULTING IN THE FAILURE OF CLOSING, AND WILDLANDS WAIVES ANY AND ALL RIGHT TO SEEK OTHER RIGHTS OR REMEDIES AGAINST GENESIS SOLAR FOR SUCH MATERIAL DEFAULT, INCLUDING WITHOUT LIMITATION, SPECIFIC PERFORMANCE. THE PAYMENT AND RETENTION OF SUCH AMOUNT AS LIQUIDATED DAMAGES IS NOT INTENDED AS A FORFEITURE OR PENALTY WITHIN THE MEANING OF CALIFORNIA CIVIL CODE SECTIONS 3275 OR 3369, BUT IS INTENDED TO CONSTITUTE LIQUIDATED DAMAGES TO WILDLANDS PURSUANT TO CALIFORNIA CIVIL CODE SECTIONS 1671, 1676 AND 1677. WILDLANDS HEREBY**

WAIVES THE PROVISIONS OF CALIFORNIA CIVIL CODE SECTION 3389.

Wildlands _____ **Genesis Solar** _____

11. Genesis Solar's Remedies. In the event that the Closing does not occur because of a material default by Wildlands under this Agreement, Genesis Solar shall, as its sole and exclusive remedy, be entitled to a refund of the Earnest Money and to recover all actual, reasonable out-of-pocket expenses incurred by Genesis Solar and paid (a) to Genesis Solar's attorneys in connection with the negotiation of this Agreement, and (b) to unrelated and unaffiliated third party consultants in connection with Genesis Solar's due diligence investigation of the Allocated Mitigation.

12. No Broker. Each of the Parties hereto represents to the other that it has dealt with no real estate salesperson, broker or finder in connection with this transaction, and insofar as they know, no salesperson, broker or other person is entitled to any commission, finder's fee or other compensation in connection with this transaction. If any claims for any brokers' or finders' fees for the consummation of this Agreement arise, then Wildlands hereby agrees to indemnify, hold harmless and defend Genesis Solar from and against such claims if they shall be based upon any statement, representation or agreement by Wildlands, and Genesis Solar hereby agrees to indemnify, hold harmless and defend Wildlands if such claims shall be based upon any statement, representation or agreement made by Genesis Solar.

13. Limitations on Assignment; Transfer. The Allocated Mitigation and Mitigation Values shall be non-transferable and non-assignable, except as stated herein, and shall not be used as compensatory mitigation for any other Project site or purpose, except as stated herein. Genesis Solar acknowledges that, except as stated herein, Wildlands is not willing to sell Mitigation Values which could be resold in competition with Wildlands' remaining Mitigation Values and Mitigation Property. Accordingly:

(a) Should Genesis Solar either determine that the Mitigation Values exceed the mitigation necessary for the Project or Genesis Solar declines to proceed with the Project, (with such resulting in available mitigation referred to herein as the **"Excess Mitigation"**), Genesis Solar shall have the right to (i) assign the Excess Mitigation to its successor in and to the Project; or (ii) request that Wildlands re-market the Excess Mitigation, or (iii) sell, assign or transfer such Excess Mitigation to third parties. These rights shall be subject to the following:

(i) If Genesis Solar desires to sell, transfer or assign any Excess Mitigation, other than pursuant to a transfer to a successor in and to the Project, then Wildlands shall have the exclusive and preemptory right to repurchase the Excess Mitigation, in accordance with the following terms:

a. Genesis Solar shall give Wildlands written notice (**"Excess Mitigation Notice"**) of the type and amount of Excess Mitigation and the purchase price.

b. Wildlands shall have 30 days from receipt of the Excess Mitigation Notice to exercise its right to repurchase the Excess Mitigation by giving Genesis Solar written notice (**"Exercise Notice"**) that Wildlands has elected to exercise its right to repurchase the

Excess Mitigation. Wildlands shall pay the repurchase amount in full within 60 days after the date of the Exercise Notice.

(ii) Genesis Solar alone shall be responsible for obtaining the approval to sell, assign, or transfer the Excess Mitigation. In that regard, Wildlands has made and makes no representation, warranty or guaranty that the applicable regulatory agencies will approve the Excess Mitigation as suitable mitigation for other projects. Notwithstanding the foregoing, Wildlands shall use its commercially reasonable efforts to re-market the Excess Mitigation upon Genesis Solar's rquest, and will reasonable cooperate with Genesis Solar's efforts to obtain the applicable regulatory agencies' approval for use of the Excess Mitigation by providing information required by the applicable regulatory agencies and executing documents required by the applicable regulatory agencies. Wildlands shall not be obligated to bear any cost greater than a nominal expense or incur any additional liability in connection with such cooperation.

The Limitations on Assignment and Transfer provision shall survive the Closing.

14. Miscellaneous Provisions.

(a) Ownership of Documents. All work papers, drawings, internal memoranda of any kind, photographs, and any written or graphic material, however produced, prepared by Wildlands in connection with its performance of services hereunder shall be, and shall remain after termination of this Agreement, the property of Wildlands, and may be used by Wildlands for any purpose whatsoever. Wildlands agrees to return to Genesis Solar upon termination of this Agreement all documents, drawings, photographs and other written or graphic material, however produced, received from Genesis Solar and used by Wildlands in the performance of its services hereunder.

(b) Notices. All notices, demands, consents, requests or other communications required to or permitted to be given pursuant to this Agreement shall be in writing, shall be given only in accordance with the provisions of this Section, shall be addressed to the Parties in the manner set forth below, and shall be conclusively deemed to have been properly delivered: (a) upon receipt when hand delivered during normal business hours (provided that notices which are hand delivered shall not be effective unless the sending party obtains a signature of a person at such address that the notice has been received); (b) upon receipt when sent by facsimile prior to 5:00 p.m. Pacific Standard Time of a given Business Day (otherwise such receipt is deemed as of the following Business Day) to the number set forth below (provided, however, that notices given by facsimile shall not be effective unless the sending party's machine provides written confirmation of successful delivery thereof); (c) upon the day of delivery if the notice has been deposited in a authorized receptacle of the United States Postal Service as first-class, registered or certified mail, postage prepaid, with a return receipt requested (provided that the sender has in its possession the return receipt to prove actual delivery); or (d) one (1) Business Day after the notice has been deposited with either FedEx or United Parcel Service to be delivered by overnight delivery (provided that the sending party receives a confirmation of actual delivery from the courier). The addresses of the Parties to receive notices are as follows:

To Wildlands: Wildlands California Holdings, LLC
3855 Atherton Road
Rocklin, California 95765
Attention: Sherrie R. Aland, Corporate Counsel
Telephone: (916) 435-3555
Facsimile: (916) 435-3556

To Genesis Solar: Genesis Solar, LLC
700 Universe Boulevard Law/JB
Juno Beach, Florida 33408
Attention: Ashley F. Pinnock, Esq.
Telephone: (561) 304-5127
Facsimile: (561) 691-7794

To First American: First American Fund Control, Inc.
P.O. Box 25619
Santa Ana, CA 92799
Attention: Holding Escrow Department
Telephone: (866) 536-0179
Facsimile: (866) 536-0177

For Overnight Delivery:
First American Fund Control, Inc.
200 Commerce
Irvine, CA 92602

Any Party may change its address for purposes of this section by giving the other Party written notice of the new address in the manner set forth above.

(c) Partial Invalidity. If any term or provision of this Agreement or the application thereof to any person or circumstance shall, to any extent, be invalid or unenforceable, the remainder of this Agreement, or the application of such term or provision to persons or circumstances other than those as to which it is held invalid or unenforceable, shall not be affected thereby, and each such term and provision of this Agreement shall be valid, and shall be enforced to the fullest extent permitted by law.

(d) Waivers. No waiver of any breach of any covenant or provision herein contained shall be deemed a waiver of any preceding or succeeding breach thereof, or of any other covenant or provision herein contained. No extension of time for performance of any obligation or act shall be deemed an extension of time for performance of any other obligation or act except those of the waiving Party, which shall be extended by a period of time equal to the period of the delay.

(e) Successors and Assigns. This Agreement shall be binding upon and shall inure to the benefit of the successors and permitted assigns of the Parties hereto.

(f) Attorneys' Fees. In the event either of the Parties shall commence legal proceedings for the purpose of enforcing any provision or condition hereof, or by reason of any breach arising under the provisions hereof, then the successful party in such proceeding shall be entitled to court costs and reasonable attorneys' fees to be determined by the Court or arbitrator. For the purpose of this Agreement, the terms "attorneys' fees" or "attorneys' fees and costs" shall mean the fees and expenses of counsel to the Parties hereto, which may include printing, photostating, duplicating and other expenses, air freight charges, and fees billed for law clerks, paralegals, librarians and others not admitted to the bar but performing services under the supervision of an attorney. The terms "attorneys' fees" or "attorneys' fees and costs" shall also include, without limitation, all such fees and expenses incurred with respect to appeals, arbitrations and bankruptcy proceedings, and whether or not any action or proceeding is brought with respect to the matter for which said fees and expenses were incurred. The term "attorney" shall have the same meaning as the term "counsel."

(g) Entire Agreement. This Agreement (including all Exhibits attached hereto) is the final expression of, and contains the entire agreement between, the Parties with respect to the subject matter hereof and supersedes all prior understandings with respect thereto. This Agreement may not be modified, changed, supplemented, superseded, canceled or terminated, nor may any obligations hereunder be waived, except by written instrument signed by the party to be charged or by its agent duly authorized in writing or as otherwise expressly permitted herein. The Parties do not intend to confer any benefit hereunder on any person, firm or corporation other than the Parties hereto and lawful assignees.

(h) Time of Essence. Wildlands and Genesis Solar hereby acknowledge and agree that time is strictly of the essence with respect to each and every term, condition, obligation and provision under this Agreement and that failure to timely perform any of the terms, conditions, obligations or provisions hereof by either party shall constitute a material breach of and a non curable (but waivable) default under this Agreement by the party so failing to perform.

(i) Relationship of Parties. Nothing contained in this Agreement shall be deemed or construed by the Parties to create the relationship of principal and agent, a partnership, joint venture or any other association between Genesis Solar and Wildlands, except as provided in this Agreement.

(j) Construction. Headings at the beginning of each paragraph and subparagraph are solely for the convenience of the Parties and are not a part of the Agreement. Whenever required by the context of this Agreement, the singular shall include the plural and the masculine shall include the feminine and vice versa. This Agreement shall not be construed as if it had been prepared by one of the Parties, but rather as if both Parties had prepared the same. Unless otherwise indicated, all references to paragraphs, sections, subparagraphs and subsections are to this Agreement. All exhibits referred to in this Agreement are attached and incorporated by this reference.

(k) Recitals/Exhibits. The Recitals set forth in this Agreement and the exhibits referenced herein are incorporated herein by this reference.

(l) Choice of Law; Venue. This Agreement shall be governed by and construed in accordance with the laws of the State of California. Any suit, action or proceeding brought under the scope of this Agreement shall be brought and maintained to the extent allowed by law in the County of Sacramento, California.

(m) Counterparts. This Agreement may be executed in multiple counterparts, each of which shall be deemed an original, but all of which, together, shall constitute one and the same instrument.

(n) Days of Week. A **"Business Day,"** as used herein, shall mean any day other than a Saturday, Sunday or holiday, as defined in Section 6700 of the California Government Code. If any date for performance herein falls on a day other than a Business Day, the time for such performance shall be extended to 5:00 p.m. Pacific Standard Time on the next Business Day.

(o) Electronic Transmittals. The Parties agree that if this Agreement is transmitted electronically, the electronic transmittal of the original execution signatures shall be treated as original signatures and given the same legal effect as an original signature.

(p) Representation by Counsel. Notwithstanding any rule or maxim of construction to the contrary, any ambiguity or uncertainty shall not be construed against either Genesis Solar or Wildlands based upon authorship of any of the provisions hereof. Genesis Solar and Wildlands each hereby warrant, represent and certify to the other as follows: (i) that the contents of this Agreement have been completely and carefully read by the representing party and counsel for the representing party; (ii) that the representing party has been separately represented by counsel and the representing party is satisfied with such representation; (iii) that the representing party's counsel has advised the representing party of, and the representing party fully understands, the legal consequences of this Agreement; and (iv) that no other person (whether a party to this Agreement or not) has made any threats, promises or representations of any kind whatsoever to induce the execution hereof, other than the performance of the terms and provisions hereof.

(q) Confidentiality. Each party hereto agrees that, except with the prior written permission of the other party hereto, it shall at all times keep confidential and not divulge, furnish, or make accessible to anyone any confidential information, knowledge, or other information concerning or relating to (1) the business or financial affairs of any other party to which such party has been or shall become privy by reason of this Agreement, (2) the terms of this Agreement or any transaction contemplated hereby, (3) the content of any discussions or negotiations relating to this Agreement, and (4) the performance of obligations hereunder (collectively, the "Confidential Information"); provided, however, that each party may disclose the terms and conditions of this Agreement (i) as required by any court or other governmental body or as otherwise required by law, (ii) to legal counsel of the parties, (iii) in confidence to accountants, banks and financing sources and their advisors, and to employees and affiliates on a "need to know" basis, (iv) in connection with the enforcement of this Agreement or rights under this Agreement, (vi) to the government, (vii) or in confidence by Wildlands to actual or potential investors or owners in Wildlands, or (vii) or in confidence by Genesis Solar to actual or potential investors or owners in Genesis Solar. In the event that any party is requested or required (by oral

question or request for information or documents in any legal proceeding, interrogatory, subpoena, civil investigative demand or similar process) to disclose any Confidential Information other than as permitted above, such party shall notify the other party hereto promptly of the request or requirement so that such party may seek an appropriate protective order or waive compliance with the provisions of this subsection (p). If, in the absence of a protective order or the receipt of a waiver hereunder, any party is, on the advice of counsel, compelled to disclose any Confidential Information to any tribunal or else stand liable for contempt, such party may disclose the Confidential Information to the tribunal; provided that such disclosing party shall use its best efforts to obtain an order or other assurance that confidential treatment shall be accorded to such portion of the Confidential Information required to be disclosed.

IN WITNESS WHEREOF, the Parties hereto have executed this Agreement as of the dates set forth below.

WILDLANDS CALIFORNIA HOLDINGS, LLC, a California limited liability company

By: Wildlands, Inc., a Delaware corporation
Its: Manager

By: _____

Its: COO & General Counsel

Date: 12/23/2010

GENESIS SOLAR, LLC, a Delaware limited liability company

By: _____

Its: Vice President

Date: Dec 29, 2010

BIO-27 - *Couch's spade foot toad impact avoidance and minimization measures*

Verification: No less than 30 days prior to construction-related ground disturbance the Project owner shall submit to the CPM and CDFG a final Protection and Mitigation Plan. Modifications to the Protection and Mitigation
Plan shall be made only after approval from the CPM, in consultation with CDFG.
If the Protection and Mitigation Plan includes creation of ponds, the number and acreage of created ponds shall be described in the plan. No less than 90 days prior to operation of Project the Project owner shall provide to the CPM as-built drawings and photographs of the created ponds and maps showing the size and location of the ponds in relation to project features. On January 31st of every year following initiation of operation of the Project the Project owner shall submit reports to the CPM documenting the capacity of the created ponds to hold water for at least 9 days during the spadefoot toad breeding season. If ponds fail to hold water as described above the Project owner shall implement remedial actions. The annual reporting may be terminated upon satisfactory demonstration of this performance standard, and with approval of the CPM.

Response:
No mitigation ponds were built, see attached.

Couch's Spadefoot Toad Protection and Mitigation Plan

for the

Genesis Solar Energy Project

Docket No. 09-AFC-8

Prepared for:

Genesis Solar, LLC

Prepared by:

TETRA TECH EC, INC.

Tetra Tech EC, Inc
143 Union Blvd, Suite 1010
Lakewood, CO 80228

January 10, 2011

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LIST OF FIGURES

1.0 INTRODUCTION

Genesis Solar, LLC (Genesis Solar) a wholly owned subsidiary of NextEra Energy Resources, LLC, is proposing to develop a 250-megawatt (MW) solar thermal power generating facility located in Riverside County, CA, between the community of Desert Center and the city of Blythe. The Genesis Solar Energy Project (Project) is located on land managed by the Bureau of Land Management (BLM). The Project Disturbance Area, which includes both permanent and temporary disturbance, will be approximately 1,819.5 acres, which includes approximately 1,727 acres for the Plant Site and approximately 92.5 acres for Linear Facilities. The Plant Site includes the solar arrays, power blocks, power generating equipment, support facilities, and evaporation ponds. The Linear Facilities include a transmission line, distribution line, natural gas pipeline, and a main access road that would be mostly co-located for approximately 6.5 miles (Figure 1).

Comprehensive biological resource surveys for special-status species and their habitats were conducted in 2009 and 2010. Biologists surveyed for habitat potentially suitable for breeding for the Couch's spadefoot toad (*Scaphiopus couchii)*, a BLM Sensitive Species and a California Species of Special Concern. Biologists identified one area where Couch's spadefoot toad have been historically known to breed, as well as other areas containing potential breeding habitat along the Linear Facilities route. Therefore, it is possible that Project development will affect Couch's spadefoot toad and this Couch's Spadefoot Toad Protection and Mitigation Plan (Plan) has been produced to address and minimize any impacts if they cannot be avoided.

1.1 Purpose and Objectives

The purpose of this Plan is to identify and describe avoidance, minimization, and mitigation measures that will address impacts on Couch's spadefoot toad and their breeding habitat during Project construction and operation, as required by the California Energy Commission's (CEC) Condition of Certification BIO-27 (CEC 2010). This Plan also satisfies BLM mitigation requirements. The Plan includes detailed avoidance and minimization measures, implementation methods, and guidance for mitigation if direct impacts on breeding habitat cannot be avoided.

Specific Plan objectives include:

1. Identify the areas within the Project Disturbance Area where Couch's Spadefoot toads potentially could breed.
2. Identify potential Project impacts on Couch's Spadefoot toad breeding habitat.
3. Identify and describe how the Project will avoid and protect toads and their breeding areas.
4. Identify and describe mitigation measures in the event that direct impacts on breeding habitat are unavoidable.
5. Describe monitoring of mitigation sites (created ponds), if mitigation sites are necessary.

2.0 Background

2.1 Life History

Couch's spadefoot toad is found in southeastern California, east through Arizona, New Mexico, Texas, and Oklahoma, and south to San Luis Potosi, Nayarit, Mexico, at the southern tip of Baja California, Mexico; there is also an isolated population in Colorado. In California, it is found in the extreme southeast, including southeastern San Bernardino County and eastern Riverside and Imperial Counties (Jennings and Hayes 1994). The Project area is west of the range for this species as the range as described in the Northern & Eastern Colorado Desert Coordinated Management Plan (NECO; BLM and California Department of Fish and Game [CDFG] 2002). The closest known record for this species is from a breeding pond in an old borrow pit near the intersection of I-10 and Wiley's Well Road (Dimmitt 1977 in Jennings and Hayes 1994).

Habitat for the Couch's spadefoot toad consists of extremely xeric areas with sandy, well-drained soils, often associated with creosote bush and mesquite trees (Arizona-Sonora Desert Museum 2010). Friable soils are important, as adults bury themselves and dig burrows to avoid desiccation. Couch's spadefoots can remain underground without emerging for as many as two rainless summers (CaliforniaHerps 2010). For breeding, they require temporary ponds that hold water for a sufficient amount of time to reproduce, typically at least eight or nine days. These ponds are created during seasonal rainstorms; thunder and/or very low levels of precipitation (< 0.5 mm) elicit emergence from subterranean burrows (Dimmitt and Ruibal 1980).

2.2 Survey Methods

Biologists conducted comprehensive field surveys for all special-status species and their habitat within the Project Area and vicinity in Spring 2009, Fall 2009, Spring 2010, and Fall 2010 (Tetra Tech and Karl 2009, 2010). The survey area encompassed 4,640 acres, plus Linear Facilities (100% visual coverage) and buffer surveys out to one mile (Figure 2). During surveys, biologists identified and mapped all temporary natural (washes, runnels, swales [shallow depression], and dune slacks) and artificial (borrow pit, man-made swales) water catchments that could serve as breeding pools for Couch's spadefoot toad.

Surveys were planned for Summer 2010 to verify the presence of breeding toad populations within the potential breeding habitat identified during 2009 and 2010 field surveys. Toad activity patterns are generally coincident with summer storms; therefore, biologists monitored rainfall daily during August and September 2010 via internet weather stations and a local contact in Blythe, CA. However, surveys to locate toads could not be conducted due to insufficient rainfall.

2.3 Survey Results

Biologists did not observe any Couch's spadefoot toad during field surveys, likely because the timing of the surveys fell outside of the species' greatest activity period; however, biologists detected potential suitable breeding habitat within and adjacent to the Project Disturbance Area (Tetra Tech and Karl 2010). This included the man-made borrow pit south of Interstate 10 (I-10) near Wiley's Well Road that crosses the Project's transmission line route (Figure 3), plus a man-made swale located north and parallel to I-10 and a low-lying area along the transmission line (Figure 3). No potential breeding habitat was detected within the Plant Site.

The approximately 35-acre borrow pit south of I-10 is a man-made depression that contains a honey mesquite (*Prosopis glandulosa*)-tamarisk (*Tamarix sp.*)-palo verde (*Cercidium floridum*) bosque that is likely sustained by seasonal flooding. Its water source is runoff from the mountains to the south, which enters the borrow pit mostly from the west side, but may also receive water from the east side (east side of Wiley's Well Road), although less frequently. There is a culvert under Wiley's Well Road that connects west and east sides of the borrow pit. This borrow pit is the same location where breeding toads were observed by Dimmitt in 1976 (Dimmitt 1977 in Jennings and Hayes 1994), and the only area within or immediately adjacent to the Project Disturbance Area where toads have been observed historically. During Spring 2010 surveys, the soils in the borrow pit were moist but there was little to no standing water. Soils were cracked at the surface, indicating that water periodically pools in this area. The borrow pit was checked for moisture after a rain event in October 2010 but the soils were dry, and during a rain event in December 2010. In December the soils were moist to approximately two inches below the surface but there was no standing water.

Areas within the swale north of I-10 potentially contain suitable Couch's spadefoot toad breeding habitat; however, there are no recorded toad occurrences in this area and water did not pool at this location after rain events in October and December 2010. Within this swale there are two areas that contain palo verde and ironwood [*Olneya tesota])* and vegetation that is denser than the areas surrounding the swale, indicating that this area receives more water than adjacent areas and therefore has a higher likelihood of pooling on a routine basis (Figure 3). Both of these areas of potential habitat are outside of the Project Disturbance Area. One of the areas is located southwest of the Linear Facilities route and is dominated by palo verde and ironwood. The other area, located directly north of Wiley's Well Rest Area, contains mostly tamarisk*;* an existing two-track dirt road crosses the swale within this vegetated area.

An area along the Project transmission line south of I-10 (where the Project transmission line will be mounted on poles of the Blythe Energy Project Transmission Line [BEPTL]) potentially contains suitable Couch's spadefoot toad breeding habitat; however, there are no recorded toad occurrences in this area. This area contains palo verde and iron wood and is located at the terminus of an ephemeral drainage coming from the mountains to the south. The type and increased size of vegetation indicates that the area receives more water than the adjacent areas, although water did not pool at this location after a large rain event in December 2010.

The majority of the Project Disturbance Area does not contain Couch's spadefoot toad breeding habitat; no breeding habitat exists within the Plant Site. The majority of Project facilities are located in upland communities (Sonoran Creosote Bush Scrub with patches of Stabilized or Partially Stabilized Sand Dunes) that lack the necessary soils and low-lying topographic features that enable water to routinely pool during large rain events. Although vegetation is an indicator of how much water an area receives, not all areas containing trees and larger, lusher vegetation are potential Couch's spadefoot toad breeding areas. For instance, there are ephemeral washes coming off of the surrounding mountains, ultimately draining into Ford Dry Lake, that contain trees and relatively lush vegetation; however, these ephemeral channels don't exhibit evidence of ponding.

3.0 Impacts

The Project could have direct and indirect impacts on Couch's spadefoot toads. Impacts could occur during construction and operations along the Linear Facilities where breeding habitat

exists. During construction, direct impacts may include fatalities during clearing and grading if toads are underground, or strikes by construction vehicles when toads are above ground. Indirect impacts may include disturbance to breeding habitat, including changes in flow pattern into breeding ponds, or toad emergence triggered by construction vehicles when conditions are not favorable (i.e., when weather conditions are dry, hot, and standing water is not present). Direct and indirect impacts during operations are expected to be negligible due to the small area of potential breeding habitat. A detailed impact analysis is available in the Genesis Solar Energy Project Revised Staff Assessment (CEC 2010) and in the BLM Final Environmental Impact Statement (BLM 2010); however, a summary of potential Project impacts to each area of known or potential breeding habitat is described below. No potential breeding habitat exists within the Plant Site; therefore, no impacts on Couch's spadefoot toad are expected in the Plant Site.

Borrow Pit: The borrow pit will be crossed in a north/south fashion by the Project transmission line. Therefore, construction activities that will take place near the borrow pit are those associated with the transmission line and the stub roads for the transmission towers. Impacts will be avoided with implementation of the measures presented in Section 4.1, below.

Man-made Swale North of I-10: Only two areas within this swale are potential Couch's spadefoot breeding habitat. These two potential breeding areas will not be crossed by Project facilities (Figure 3).

Low Lying Area along the Transmission Line: The Project transmission line will cross this area of potential breeding habitat; however, the transmission line will be mounted on existing poles of the BEPTL. Construction activities will be restricted to previously disturbed area and no additional impacts are anticipated in this area. Potential impacts will be avoided and minimized by implementing the protection measures in Section 4.2

4.0 Protection Measures

The following measures will ensure that previously identified Couch's spadefoot toad breeding habitat, as well as potential breeding habitat is avoided and impacts on breeding toads, should they be present, are minimized. The borrow pit, which is the only area where toad presence has been verified, will be avoided and no new ground disturbance is expected near the potential breeding habitat north of I-10 or in the low-lying area along the transmission line.. If, at any point during construction, operations, or decommissioning, other breeding sites are incidentally discovered and verified to be Couch's spadefoot breeding habitat (toads or toad larvae are present) and could be impacted by the Project, the following avoidance and minimization measures will also apply to those areas.

4.1 Avoidance Measures

The Project will avoid direct impacts on the known breeding habitat in the borrow pit along the transmission line route (Figure 3). The transmission line poles and their respective stub roads will be constructed such that the foundations and roads are located on either side of the borrow pit, and the conductor (power line) will be suspended above the borrow pit. No soil or water from construction activities will be permitted to enter the pit. To achieve this avoidance, the following will occur:

- The borrow pit will be depicted as an avoidance area on all construction drawings.

- The borrow pit will be clearly marked with flagging, signs, staking, etc. to exclude construction personnel and equipment. Foot traffic within the borrow pit will avoided to the greatest extent feasible.

- The borrow pit will be marked to maintain a minimum 50 ft[1] buffer between construction activity and the breeding area to avoid indirect impacts such as changes in flow or sediment deposition to the borrow pit as a result of Project activities. If necessary, coirs or other barriers will be installed to prevent flow into the pit.

- Utility lines (e.g., conductor, telecommunications line) will not be permitted to touch the ground between poles at any time during construction or unless a monitor is present.

4.2 Minimization Measures

Minimization measures will be implemented as below to minimize impacts to known or potential Couch's spadefoot toad breeding habitat.

- The Designated Biologist (DB) or a biological monitor (BMs) will be present during construction activities to survey for emergence of toads due to natural or unnatural triggers. BMs will have the authority to halt construction if toads are in danger of being harmed by construction activities. If a toad is detected, the following will occur:

    - When feasible, the toad should be allowed to move out of harm's way on its own accord.
    - If the toad is outside of the work area and/or not in immediate danger of being harmed by construction activities, the toad will be left in place and monitored by the DB or BM.
    - If the toad is within the work area and in harm's way, the DB or BM will remove the toad from the work area to nearby, similar habitat. The DB or BM will monitor the toad to ensure it does not re-enter the work area.

- Silt fencing will be installed around construction activities that take place near potential breeding habitat during the breeding season to prevent toads from entering construction areas.

- All construction activities will stay within the designated disturbance area to avoid additional impacts on vegetation surrounding the potential breeding habitat.

- No equipment maintenance involving hazardous materials (e.g., re-fueling, oil changes) will take place within 150 ft of any ephemeral drainage, which includes potential toad breeding habitat (consistent with Condition of Certification BIO-22, Impacts on State Waters).

- Construction traffic will be restricted to only the vehicles and equipment necessary to complete the work within the vicinity of the potential breeding habitat.

[1] A buffer area of 50 ft was determined sufficient to minimize impacts because the majority of the flow to the borrow pit is from runoff which enters at the west and east end. No construction activities will take place at the areas of inflow and are therefore not expected to impact breeding habitat due to changes in flow levels and patterns.

- During the breeding season, nighttime construction will not be permitted and nighttime Project-associated travel in the area of the breeding pond will be minimized, or eliminated if possible.
- No construction personnel will be permitted within the marked avoidance areas.
- Construction personnel will be trained to recognize the Couch's spadefoot toad during the Worker Environmental Awareness Program and required to notify a BM if a toad is observed.

5.0 Mitigation - Creation of Breeding Habitat

The Project has been designed to completely avoid known breeding habitat (i.e., the borrow pit), and as such, no mitigation breeding habitats are planned. However, if additional breeding habitat is confirmed (i.e., toads or toad larvae are present) within the Project Disturbance Area, ponds will be created to compensate for lost breeding habitat. At that time, this Plan will be revised, with approval from the CEC's Compliance Project Manager (CPM) and CDFG, to include the location, number, and acreage of the created ponds. The created ponds will adhere to the following criteria, in accordance with Condition of Certification BIO-27:

- Be at least equal in size to the acreage of ponds affected by the Project.
- Be ephemeral, but capable of holding water for at least nine days during the spadefoot toad breeding season (typically August and September).
- Be created as close as possible, but no more than ¼ mile, from the location of the breeding habitat affected by the Project.

Ponds will be created by using a backhoe or similar piece of equipment to dig a shallow depression, sufficiently deep and broad to hold water for 9 days, assuming summer monsoon rainfall amounts that would be sufficient to fill other adequate breeding ponds. If use of heavy equipment would cause additional, unreasonable disturbance, ponds will be dug using hand tools. Soils on the bottom and sides of the depression will be compacted to facilitate pooling. Ponds will then be manually or mechanically filled with water to simulate an adequate monsoon and ensure soil compaction is sufficient to pool water.

5.1 Monitoring and Management of Mitigation Sites

In the event that ponds need to be created, the created ponds will be monitored and managed by the DB or BMs to ensure that the performance standards (see Section 5.0) are met. Once the ponds are manually filled with water to test water-holding capacity, the DB or BM will monitor the pond daily to verify that there is standing water for a minimum of nine days. Additionally, the DB or BM will visit the created pond after a substantial summer rainfall event to ensure natural ponding occurs. If the created ponds have failed to achieve natural ponding, the DB or BM will facilitate the implementation of measures to remedy the problem, which would include further compacting soils to increase water-holding capacity, or contouring the surrounding soils to facilitate run-off into the created pond. Monitoring will continue until the DB or BM can verify that performance standards have been met.

6.0 REPORTING

If the created ponds are required for mitigation, Genesis Solar will provide verification of successful pond construction to the CPM. Reporting will be as follows:

1) No less than 90 days prior to Project operation, Genesis Solar will submit as-built drawings, photographs of the created ponds, and maps showing the size and location of the ponds in relation to Project facilities to verify pond construction.

2) On January 31st of every year following initiation of Project operation, Genesis Solar will submit reports documenting the ability of the created ponds to hold water for at least nine days during the Couch's spadefoot toad breeding season. Annual reports may be terminated upon satisfactory demonstration that the performance standards have been met and with CPM approval.

7.0 REFERENCES

Arizona-Sonora Desert Museum. 2010. Couch's spadefoot (*Scaphiopus couchi*). Available at http://www.desertmuseum.org/books/nhsd_spadefoot.php

BLM and CDFG (Bureau of Land Management and California Department of Fish and Game). 2002. Final Environmental Impact Statement. Proposed Northern & Eastern Colorado Desert Coordinated Management Plan (NECO). Bureau of Land Management, California Desert, Riverside, CA.

CaliforniaHerps. 2010. California Reptiles and Amphibians. http://www.californiaherps.com/frogs/pages/s.couchii.html#moreinfo Site Accessed December 30, 2010.

CEC (California Energy Commission). 2007. Recommended biological resources field survey guidelines for large solar projects. Draft. 31 May 2007.

---. 2010. Commission decision on the Genesis Solar Energy Project. Docket No.09-AFC-8. 710 pp.

Dimmitt, M.A. 1977. Distribution of Couch's spadefoot toad in California (preliminary report). Prepared under Contract Nos. C-062, 6500 and 1792 Sundesert for the Bureau of Land Management, Riverside, California. Unpub. rept.

--- and R. Ruibal. 1980. Environmental correlates of emergence in spadefoot toads (*Scaphiopus*). J. Herp.14(1):21-29.

Jennings, M.R. and M.P. Hayes. 1994. Amphibian and reptile species of concern in California. Prepared under Contract No. 8023 for the California Department of Fish and Game, Rancho Cordova, CA. 255 pp.

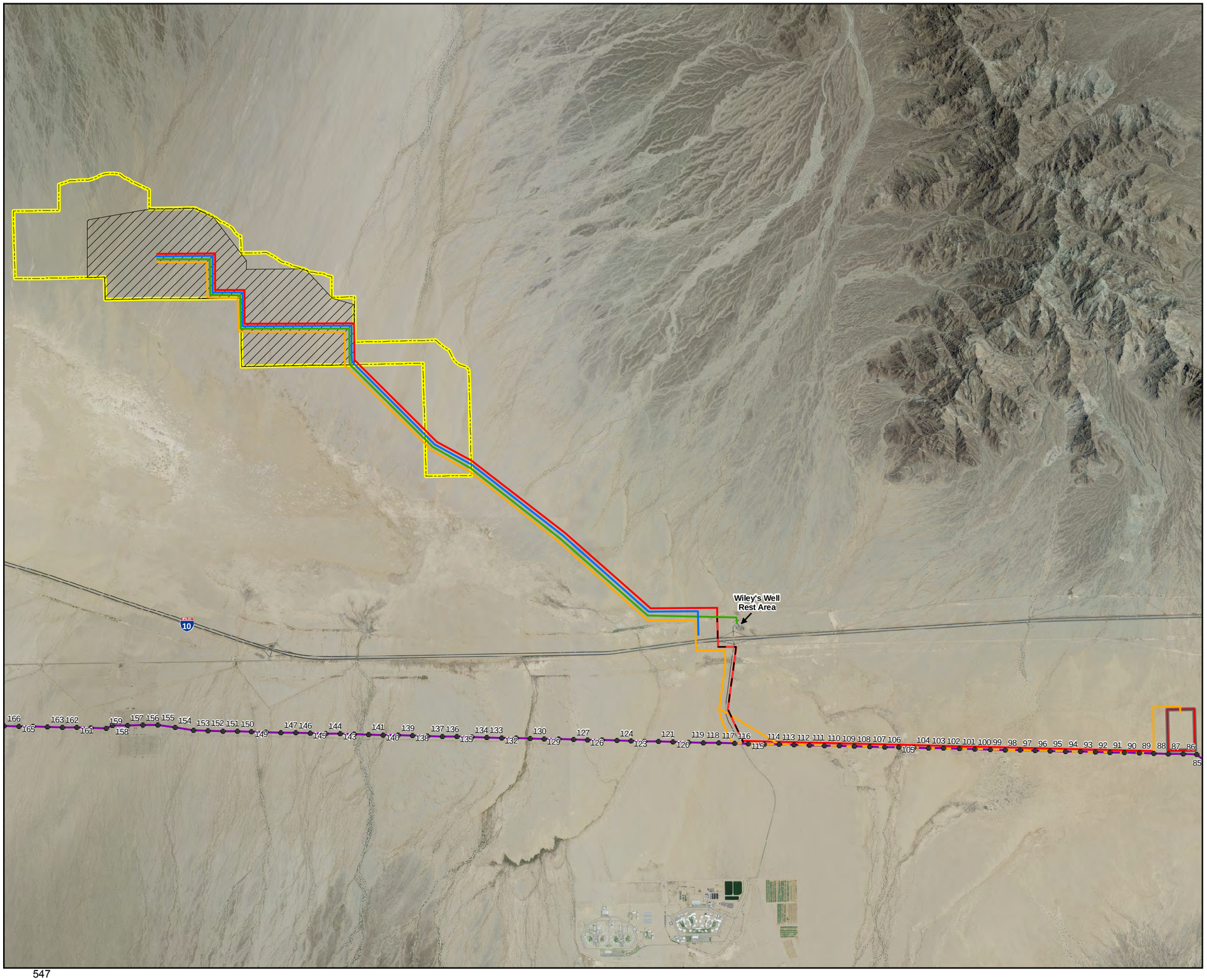
Tetra Tech EC, Inc. and A. Karl. 2009. Biological Resources Technical Report; Genesis Solar Energy Project, Riverside County, CA. August.

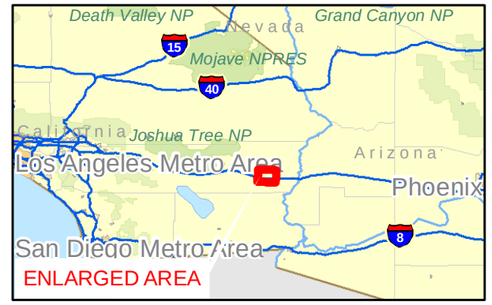
Tetra Tech EC, Inc. and A. Karl. 2010. Fall 2009 and Spring 2010 Biological Resources Technical Report; Genesis Solar Energy Project, Riverside County, CA. June.

Figures

Genesis Solar, LLC

GENESIS SOLAR ENERGY PROJECT
RIVERSIDE COUNTY,
CALIFORNIA





- Blythe Energy Project Transmission Line
- Blythe Energy Project Transmission Line Structure
- Transmission Interconnect
- Genesis Transmission Interconnect on Existing BETL Poles
- Gas Line
- Access Road
- Distribution Line/Redundant Communication Line
- Redundant Communication Line in Existing ROW
- Project Requested ROW
- Genesis Plant Site
- Colorado River Substation

N

0 0.5 1 1.5 2
Miles

Notes:
(a) UTM Zone 11, NAD 1983 Projection.
(b) Source data: ESRI, TTEC, USDA, Riverside County, A. Karl & Assoc.

FIGURE 1
FACILITY LAYOUT

TETRA TECH EC, INC

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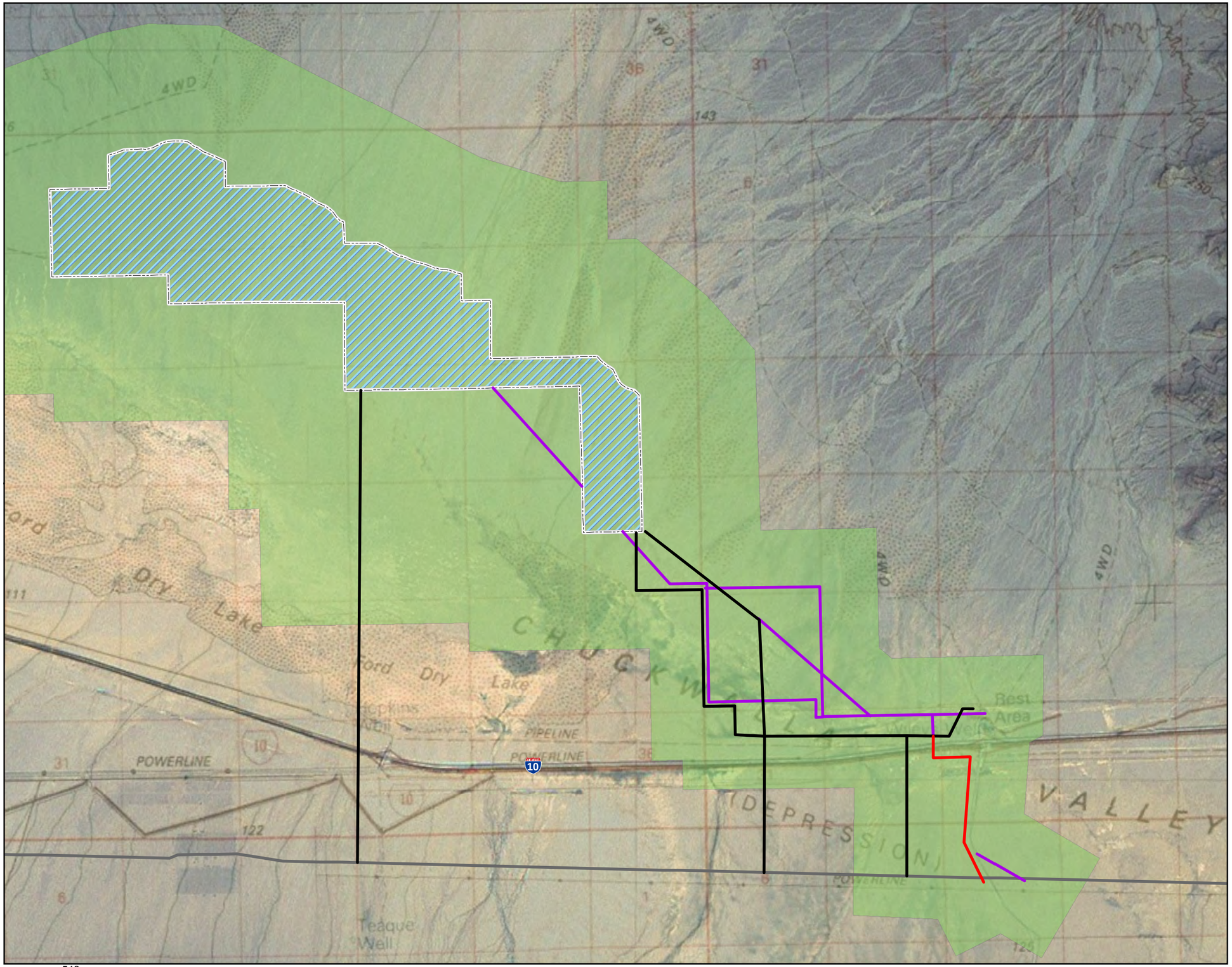

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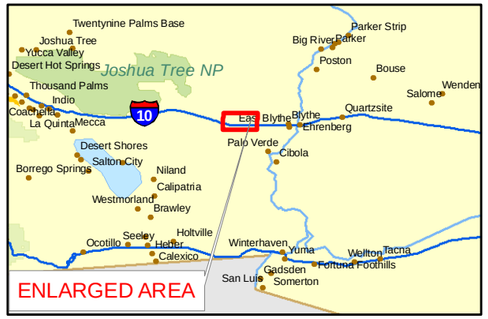
GENESIS SOLAR, LLC

GENESIS SOLAR ENERGY PROJECT
RIVERSIDE COUNTY,
CALIFORNIA



Legend

- Routes Surveyed for Biological Resources Fall 2009 & Spring 2010
- Routes Surveyed for Biological Resources Spring 2009
- Routes Surveyed for Biological Resources Spring 2010
- Blythe Transmission Line
- Project Site
- Spring 2009 Survey Area
- Zone of Influence Survey Extent

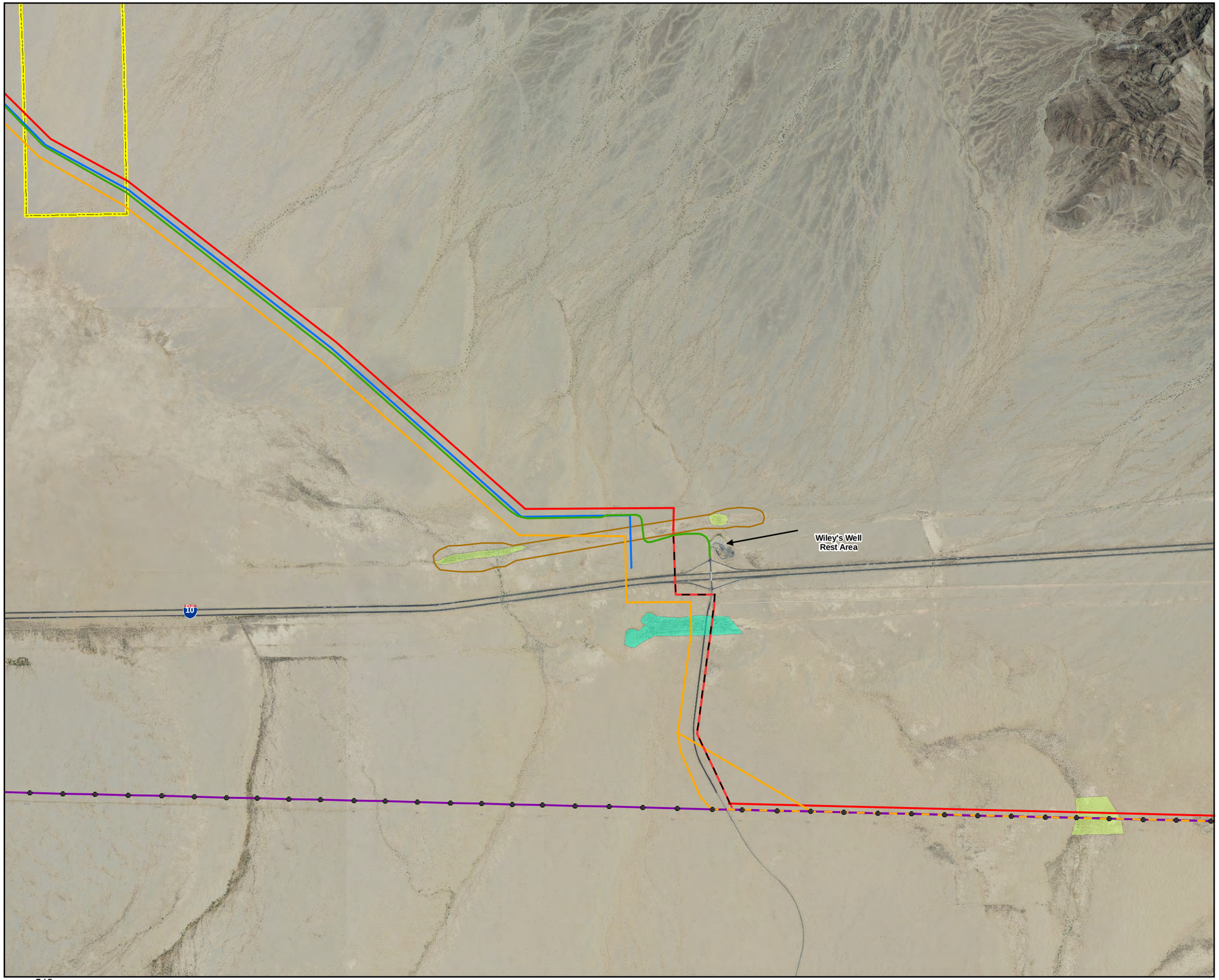
N

0 2,000 4,000 6,000 8,000
Feet

Notes:
(a) UTM Zone 11, NAD 1983 Projection.
(b) Source data: ESRI, BLM, TTEC

FIGURE 2
OVERVIEW OF
COUCH'S SPADEFOOT TOAD
SURVEY AREA

TETRA TECH EC, INC.



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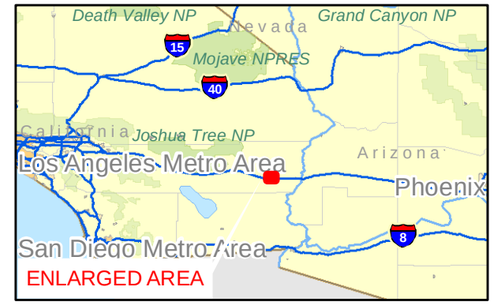
Genesis Solar, LLC

GENESIS SOLAR ENERGY PROJECT
RIVERSIDE COUNTY,
CALIFORNIA



- Blythe Energy Project Transmission Line
- Blythe Energy Project Transmission Line Structure
- Transmission Interconnect
- Transmission Interconnect on Existing Poles
- Gas Line
- Access Road
- Distribution Line/Redundant Communication Line
- Redundant Communication Line in Existing ROW
- Project Requested ROW
- Known Couch's Spadefoot Toad Habitat
- Potential Couch's Spadefoot Toad Habitat
- Man-made Swale

N

0 0.5 1
Miles

Notes:
(a) UTM Zone 11, NAD 1983 Projection.
(b) Source data: ESRI, TTEC, USDA, Riverside County, A. Karl & Assoc.

FIGURE 3
COUCH'S SPADEFOOT TOAD HABITAT IN RELATION TO PROJECT FACILITIES

TETRA TECH EC, INC

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HAZ-1 – Appendix A

HAZ-1 The project owner shall not use any hazardous materials not listed in Appendix A, below, or in greater quantities or strengths than those identified by chemical name in Appendix A, below, unless approved in advance by the Compliance Project Manager (CPM).

Verification: The project owner shall provide to the CPM, in the Annual Compliance Report, a list of hazardous materials contained at the facility.

Response:

All materials on site are listed in Appendix A

Waste Stream	Waste Stream Classification	Estimated Amount	Estimated Frequency of Generation	No. Truck Trips and Frequency	Quantity Shipped	Anticipated Route
Scrap wood, glass, plastic, paper,	Non-hazardous solids	25,000 lbs.	Annually	12, 1X monthly	0	**Riverside County Landfill**
Class III garbage.						From Hwy 10 exit Lovekin Blvd.
						North Lovekin Blvd. to Midland Rd.
						Left Midland Rd. to Landfill on Right.
Used hydraulic fluid, oils, grease, oily filters	Hazardous or non-hazardous liquids	500 lbs.	Annually	1 truck 1X	0	**Ashbury Environmental**
Oil rags, oil absorbent generated during normal operation activities excluding lube oil flushes	Hazardous liquids	500 lbs.	Annually	1 truck 1X	0	1. Start on Wiley's Well Road 0.4
						2. Turn Right on S 7TH ST/S C AND D BLVD 0.2
						3. Continue on 7TH ST 0.1
Liquid Lab Waste	Hazardous liquids	500 lbs.	Annually	1 truck 1X		4. Turn Left to take the I-10 EAST ramp 0.2
Solvents, paint, adhesives	Hazardous liquids	50 lbs.	Annually	1 truck 1X	0	5. Merge on I-10 EAST 145.6
Spent lead acid batteries	Universal solids	50 lbs.	Annually	1 truck 1X	0	6. Take the I-10-TRUCK ROUTE/I-17 SOUTH exit, exit #143B 0.7
Spent alkaline batteries	Universal waste	25 lbs.	Annually	1 truck 1X	0	7. Merge on I-17
Waste oil from oily water separator	Hazardous or non-hazardous liquids	50 lbs.	Annually	1 truck 1X	0	

Waste Stream	Waste Stream Classification	Estimated Amount	Estimated Frequency of Generation	No. Truck Trips and Frequency	Quantity Shipped	Anticipated Route
Fluorescent, mercury vapor lamps	Universal Waste solids	25 lbs.	Annually	1 truck 1X	0	SOUTH 5.4 8. Take the I-10 EAST exit towards TUCSON 0.6 9. Merge on I-10 EAST 13.0 10. Take the MARICOPA RD NORTH exit, exit #162B 0.2 11. Turn Right on S MARICOPA RD 0.4 12. Continue on S 56TH ST/S MARICOPA RD 0.4 13. Turn Right on W ALLISON RD 0.2
Waste Stream	Waste Stream Classification	Estimated Amount	Estimated Frequency of Generation	No. Truck Trips and Frequency	Quantity Shipped	**Anticipated Route**
HTF Soil	Hazardous solids	2,000 lbs	1X every year	1 truck 1X	0	**Romic Environmental** 1. Start on E HOBSONWAY 0.4 2. Turn Right on S 7TH ST/S C AND D BLVD 0.2 3. Continue on 7TH ST 0.1 4. Turn Left to take the I-10 EAST ramp 0.2

Waste Stream	Waste Stream Classification	Estimated Amount	Estimated Frequency of Generation	No. Truck Trips and Frequency	Quantity Shipped	Anticipated Route
						5. Merge on I-10 EAST 145.6 6. Take the I-10-TRUCK ROUTE/I-17 SOUTH exit, exit #143B 0.7 7. Merge on I-17 SOUTH 5.4 8. Take the I-10 EAST exit towards TUCSON 0.6 9. Merge on I-10 EAST 13.0 10. Take the MARICOPA RD NORTH exit, exit #162B 0.2 11. Turn Right on S MARICOPA RD 0.4 12. Continue on S 56TH ST/S MARICOPA RD 0.4 13. Turn Right on W ALLISON RD 0.2 Distance: 167.4 miles Approximate Travel Time: 2 hours 40 mins

HAZ-6 – Security Plan

The project owner shall also prepare a site-specific security plan for the commissioning and operational phases that will be available to the CPM for review and approval. The project owner shall implement site security measures that address physical site security and hazardous materials storage. The level of security to be implemented shall not be less than that described below (as per NERC 2002).
The Operation Security Plan shall include the following:
1. Permanent full perimeter fence or wall, at least eight feet high and topped with barbed wire or the equivalent;
2. Main entrance security gate, either hand operated or motorized;
3. Evacuation procedures;
4. Protocol for contacting law enforcement and the CPM in the event of suspicious activity or emergency;
5. Written standard procedures for employees, contractors, and vendors when encountering suspicious objects or packages on site or off site;

A. a statement (refer to sample, **ATTACHMENT A**), signed by the project owner certifying that background investigations have been conducted on all project personnel. Background investigations shall be restricted to determine the accuracy of employee identity and employment history and shall be conducted in accordance with state and federal laws regarding security and privacy;
B. a statement(s) (refer to sample,

ATTACHMENT B), signed by the contractor or authorized representative(s) for any permanent contractors or other technical contractors (as determined by the CPM after consultation with the project owner), that are present at any time on the site to repair, maintain, investigate, or conduct any other technical duties involving critical components (as determined by the CPM after consultation with the project owner) certifying that background investigations have been conducted on contractors who visit the project site;
6. Site access controls for employees, contractors, vendors, and visitors;
7. A statement(s) (refer to sample, **ATTACHMENT C**), signed by the owners or authorized representative of hazardous materials transport vendors, certifying that they have prepared and implemented security plans in compliance with 49 CFR 172.802, and that they have conducted employee background investigations in accordance with 49 CFR Part 1572, subparts A and B;
8. Closed circuit TV (CCTV) monitoring system, recordable, and viewable in the power plant control room and security station (if separate from the control room) with cameras able to pan, tilt, and zoom, have low-light capability, and are able to view the outside entrance to the control room and the front gate; and,
9. Additional measures to ensure adequate perimeter security consisting of either:
A. security guard(s) present 24 hours per day, 7 days per week; **or**
B. power plant personnel on site 24 hours per day, 7 days per week, and one of the following:

Perimeter Beach Protectors or CCTV able to view both site entrance gates and 100% of the power block area perimeter. The project owner shall fully implement the security plans and obtain CPM approval of any substantive modifications to those security plans. The CPM may authorize modifications to these measures, or may require additional measures such as protective barriers for critical power plant components—transformers, gas lines, and compressors—depending upon circumstances unique to the facility or in response to industry-related standards, security concerns, or additional guidance provided by the U.S. Department of Homeland Security, the U.S. Department of Energy, or the North American Electrical Reliability Council, after consultation with both appropriate law enforcement agencies and the applicant.

Verification: At least thirty (30) days prior to the initial receipt of hazardous materials on site, the project owner shall notify the CPM that a site-specific operations site security plan is available for review and approval. In the annual compliance report, the project owner shall include a statement that all current project employee and appropriate contractor background investigations have been performed, and that updated certification statements have been appended to the operations security plan. In the annual compliance report, the project owner shall include a statement that the operations security plan includes all current hazardous materials transport vendor certifications for security plans and employee background investigations.

Response:

All project employee and permanent contractor back ground checks have been performed, signed affidavits are below.

Genesis Solar LLC
Genesis Solar Energy Project
Riverside County, California
Project No. A4PA

Hazardous Materials Management Operation Site Security Plan HAZ-6

Submitted to:
California Energy Commission
Sacramento California

Submitted by:
Genesis Solar, LLC

1/23/2013 **Operation Site Security Plan**

1.0 PURPOSE

This document provides methods and information outlining the Genesis Site Specific Security Plan during operation of the Genesis Solar, LLC facility near Blythe, California.

2.0 PERIMETER SECURITY

A permanent double drive entrance gate will be installed to block access to the private main entrance road. Permanent fencing at the gate will also be installed approximately 50 feet to each side of the gate, preventing un-authorized access to or around the road. The gate will be located approximately ¼ miles north and to the West of the Wiley's Well Rest Stop. Signage will be installed indicating the road is a private road, only authorized personnel will be allowed to enter.

Initially a temporary tortoise fence was installed around the plant site proper. The temporary tortoise fence serves as the site security fence until the permanent security fence is completely installed. The amount of temporary tortoise fencing required will be approximately 8 miles and will be around the entire perimeter of the plant site proper. The completion of the temporary tortoise fence, the entire project site will be secured.

3.0 SECURITY GUARDS

Security guards will be stationed at the front access road during construction, 24 hours a day. After construction is complete, an ID scanner system will be installed at the security gate allowing personnel with badges onto the property. Visitors may be buzzed in by the control room operator after identifying him/herself. Cameras will be at the front gate to allow visibility of all visitors desiring access to the facility. A communication

protocol will be established so both security guards and site management personnel can properly communicate any issues during construction.

All employees and visitors accessing the plant site will be accounted for on a daily basis during and after work hours by the site management during operation and security guards during construction.

4.0 SUSPICIOUS OBJECTS OR PACKAGES

All employees will be given orientation in site specific safety rules and general site rules prior to their authorization to enter the site. This orientation will include the possibility of encountering suspicious objects or packages. The Safety
Supervisor must be notified of any such findings for their recommended action. In summary, the orientation will inform the workers to perform the following in the event that a suspicious object or package is encountered:

☐Inform the Site Supervisor to asses the situation.
☐Leave the suspicious package in visible sight. Do not cover up.
☐Do not try to open the package
☐Wash your hands with soap and water. Do not contaminate your face.

5.0 PROTOCOL FOR CONTACTING LAW ENFORCEMENT

Workers will immediately alert supervisors and site safety team to any emergencies, injuries or suspicious activities. All points of communication for an emergency will be administered through the Safety Supervisor and/or delegate. Emergency Numbers such as 911, contacts to law enforcement and medical facilities will be posted at appropriate places on the site near phone access.

Emergency Contact Numbers for the Genesis Project Site are the following

Department/Hospital	Address (Blythe, CA)	Phone Number
Riverside County Sheriff Dept.	260 N. Spring St.	760.921.7900
Riverside County Fire Dept.	17280 W. Hobsonway,	760.921.7825
Blythe Police Dept.	240 N. Spring St.	760.922.6111
Blythe Fire Dept.	201 N. Commercial St.	760.922.6117
Blythe Ambulance Dept.	129 S. First St.	760.922.6125
Palo Verde Hospital	250 N. First St.	760.922.4115

The California Energy Commission Compliance Project Manager will be notified of any emergency or suspicious activity in the compliance report to conform to Worker Safety-3.

6.0 EVACUATION PROCEDURES

Evacuation procedures will be in agreement Riverside County Fire Department. All onsite employees will be trained during their orientation on proper evacuation procedures and evacuation points.

Evacuation procedures and evacuation points will be established as a process from the beginning of access road to the furthest west boundaries of the site. Evacuation points will be identified and clearly marked. Evacuation will be determined at “muster points” when an evacuation is necessary. All employees will be accounted for at the muster points and should evacuation be required, employees will be escorted by evacuation leads and checks conducted to ensure all have left specific areas up to and including the entire site.

In the event of a fire, hazardous materials release or spill, or other unexpected event that could pose a threat to life safety the Safety Supervisor or delegate will be notified using the site specific emergency communication protocol and assess the situation. If the Safety Supervisor or delegate sees it necessary for alarming the workers, he/she will initiate the alarm system. The alarms are as follows:

- Area Evacuation: In the event it is necessary to evacuate the area the alarm will sound for 15 seconds repeating for 2 minutes.
- Dust Storm: In the event of a wind generated or construction related dust plume with PM10 concentrations exceeding 50 ug/m3, a 60 second alarm will sound.

All Clear: the all clear is a single sounding alarm (5-7 second alarm) four times in succession followed by a 5 – 7 second intervals between soundings. After the initiation of the alarm system the Safety Supervisor or delegate will alert the proper local emergency agencies.

If the dust storm alarm sounds, the best management practices outlined in the Dust Control Plan will be implemented.

If the area evacuation alarm sounds the following actions must be implemented immediately by all personnel:

- Shut down ALL internal combustion engines and vehicles that are not in harm’s way. All travel out of the area will be on foot unless otherwise designated by the

Safety Supervisor. The only vehicles to be allowed will be emergency vehicles responding to the emergency.

- All non-essential phone and radio traffic will cease.
- All contractor work will cease.
- Follow the instructions of the emergency response team and/or evacuation leader in a safe and orderly manner.
- Look for a vapor or smoke cloud.
- Check the wind sock atop highest point of the job site to determine wind direction.
- If a cloud is observed move cross wind away from the cloud path.
- Go directly to the assigned evacuation assembly point for the area, to be determined later

SAMPLE CERTIFICATION (Attachment B)

Affidavit of Compliance for Contractors

I, Harvey Stephens, V.P. Operations
(Name of person signing affidavit)(Title)

do hereby certify that background investigations to ascertain the accuracy of the identity and employment history of all employees of:

World Wind Services, LLC
(Company name)

for contract work at:

Genesis Solar - Blythe, CA
(Project name and location)

have been conducted as required by the California Energy Commission Decision for the above-named project.

1/30/2015
(Signature of Officer or Agent)

Dated this 30th day of January, 20 15.

THIS AFFIDAVIT OF COMPLIANCE SHALL BE APPENDED TO THE PROJECT SECURITY PLAN AND SHALL BE RETAINED AT ALL TIMES AT THE PROJECT SITE FOR REVIEW BY THE CALIFORNIA ENERGY COMMISSION COMPLIANCE PROJECT MANAGER.

SAMPLE CERTIFICATION (Attachment A)

Affidavit of Compliance for Project Owners

I, LUKE GOGUTS GENERAL MANAGER
(Name of person signing affidavit)(Title)

do hereby certify that background investigations to ascertain the accuracy of the identity and employment history of all employees of:

GENESIS SOLAR, LLC
(Company name)

for employment at:

GENESIS SOLAR, LLC BLYTHE, CA
(Project name and location)

have been conducted as required by the California Energy Commission Decision for the above-named project.

(Signature of Officer or Agent)

Dated this 30 day of JANUARY, 20 15.

THIS AFFIDAVIT OF COMPLIANCE SHALL BE APPENDED TO THE PROJECT SECURITY PLAN AND SHALL BE RETAINED AT ALL TIMES AT THE PROJECT SITE FOR REVIEW BY THE CALIFORNIA ENERGY COMMISSION COMPLIANCE PROJECT MANAGER.

United States Environmental Protection Agency
Region 9
75 Hawthorne Street , (WST-6)
San Francisco, CA 94105

August 1, 2005

FRED KNIFER
KVAC ENVIRONMENTAL SERVICES INC
PO BOX 3058
RANCHO CUCAMONGA, CA 91729

The US Environmental Protection Agency (EPA) has assigned an EPA Identification (ID) number to your location. EPA has assigned this ID number in response to the RCRA Subtitle C Site Identification Form (8700-12) received from your RCRA Subtitle C Site on May 26, 2005.

By submitting the Form 8700-12, your RCRA Subtitle C Site has notified the EPA of the Resource Conservation and Recovery Act (RCRA) regulated waste activities shown below in accordance with Section 3010 of RCRA. The EPA ID number for this location is also referred to as a 'RCRA ID number' and is to be used on transport manifests and any other hazardous waste management documents required under Subtitle C of RCRA.

RCRA ID number: CAR000163097
is assigned to: KVAC ENVIRONMENTAL SERVICES INC
8910 ROCHESTER
RANCHO CUCAMONGA, CA 91730

EPA has listed your status as:

Not a Generator, Verified
Transporter

For assistance regarding RCRA regulations, access the following websites:
http://www.epa.gov/osw/ or http://epa.gov/rcraonline/
or if you need a current version of the Subtitle C Identification Form (8700-12), access
http://www.epa.gov/epaoswer/hazwaste/data/form8700/forms.htm

For assistance with any other RCRA Notification questions please call the Notification Information Line listed below.

U.S. EPA Region 9
RCRA Notifications
75 Hawthorne Street
(WST-6/Tetra Tech)
San Francisco, CA 94105

Notification Line (415) 495-8895

RECEIVED
AUG 0 5 2005
BY:----------

UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

OFFICE OF
SOLID WASTE AND EMERGENCY
RESPONSE

RECEIVED
JUN 10 2013
BY:

OSCAR RIVERA
PO BOX 3058
RANCHO CUCAMONGA CALIFORNIA
91729

June 5, 2013

Subject: Notification of PCB Activity

Thank you for filing the Notification of PCB Activity form for the facility

Received: June 5 2013
EPA ID Number: CAR000163097
Handler Name: KVAC ENVIRONMENTAL SERVICES INC
Location Address: 8910 ROCHESTER
RANCHO CUCAMONGA CALIFORNIA
91730

Please be advised that the EPA identification number listed above was correctly stated on your form. This is the number you will use for reporting PCB activity.

If you have any questions regarding the PCB waste handlers database, please contact Steven Kohm at ORCRPCBs@epa.gov or (703) 308-0035.

Sincerely,

Dave Hockey, Chief
Cleanup Programs Branch

Linda S. Adams
Secretary for
Environmental Protection

Department of Toxic Substances Control

Deborah O. Raphel, Director
8800 Cal Center Drive
Sacramento, California 95826-3200

Edmund G. Brown Jr.
Governor

HAZARDOUS WASTE TRANSPORTER REGISTRATION
WITH CONSOLIDATED TRANSPORTER NOTIFICATION

NAME AND ADDRESS OF REGISTERED TRANSPORTER:

K-VAC ENVIRONMENTAL SERVICES INC.
P.O. BOX 3058
RANCHO CUCAMONGA, CA 91729

TRANSPORTER REGISTRATION NO: 3613

EXPIRATION DATE: JUNE 30, 2014

THIS IS TO CERTIFY THAT THE FIRM NAMED ABOVE IS DULY REGISTERED TO TRANSPORT HAZARDOUS WASTE IN THE STATE OF CALIFORNIA IN ACCORDANCE WITH THE PROVISIONS OF CHAPTER 6.5, DIVISION 20 OF THE HEALTH AND SAFETY CODE AND TITLE 22 OF THE CALIFORNIA CODE OF REGULATIONS, DIVISION 4.5.

THIS REGISTRATION CERTIFICATE MUST BE CARRIED WITH EACH SHIPMENT OF HAZARDOUS WASTE.

FOR REGISTRATION INFORMATION, PLEASE CALL (916) 440-7145.

Lori L. Patterson
(AUTHORIZED SIGNATURE)

JUN 24 2013
(DATE)

State of California - California Environmental Protection Agency

Department of Toxic Substances Control
Transportation Unit
8800 Cal Center Drive, Sacramento, CA 95826
Phone (916) 440-7145 Fax (916) 255-6436

CONSOLIDATED TRANSPORTER NOTIFICATION

1. Business Name (Show d.b.a. name, show name exactly as it will appear on registration; same name or trademark is required on all vehicles):				2. Transporter Registration Number
K-VAC Environmental Services, Inc				
3. Business Address Number/Street	**City**	**County/Province**	**State/Country**	**Zip/Postal Code**
8910 Rochester Ave	Rancho Cucamonga	SB	CA	91730
4. Mailing Address (If different) P.O. Box/Street	**City**	**County/Province**	**State/Country**	**Zip/Postal Code**
PO Box 3058	Rancho Cucamonga	SB	CA	91729

5a. Telephone Number (Ext. Number)	6. Identification Numbers. If your company transports hazardous wastes, operates the designated facility, and intends to submit only the facility copy of the consolidated manifests pursuant to Health and Safety Code Section 25160(b)(5)(A), you must provide all the transporter and facility identification numbers (12 characters) used by your company on these manifests. If necessary, list additional identification numbers on a separate sheet.	
909 4762308		
5b. Fax Number 909 4762408	CAR000163097	
5c. E-mail Address diana.knifer@kvacenv.com		

7. I intend to transport the following hazardous wastestream under the consolidated manifesting procedure, as described in Health and Safety Code, Section 25160.2. [Check all applicable box(es)]:

All

A. Used oil
B. Contents of an oil/water separator
C. Solids contaminated with used oil
D. Brake fluid
E. Antifreeze
F. Antifreeze sludge
G. Parts cleaning solvents, including aqueous cleaning solvents
H. Hydroxide sludge contaminated solely with metals from a wastewater treatment process
I. "Paint-related" wastes, including paints, thinners, filters, and sludges
J. Spent photographic solutions
K. Dry cleaning solvents (including perchloroethylene, naphtha, and silicone based solvents)
L. Filters, lint, and sludges contaminated with dry cleaning solvent
M. Asbestos and asbestos-containing materials
N. Inks from the printing industry
O. Chemicals and laboratory packs collected from K-12 schools
P. Absorbents contaminated with other wastes listed in Health and Safety Code Section 25160.2(c)
Q. Filters from dispensing pumps for diesel and gasoline fuels

8. **Name and Title of Authorized Representative** (print or type): Diana S. Knifer CEO

Signature of Authorized Representative — Use blue or other non-black ink — Date: 6/6/13

Note: Keep this Consolidated Transporter Notification, signed by DTSC, with the valid Transporter Registration Certificate in the vehicle at all times during the transportation of hazardous waste. Transportation of wastestream(s) listed above, under the consolidated manifesting procedure, without notifying DTSC is a violation of Health and Safety Code (HSC) Section 25165(a), and may be subject to significant penalties. Consolidated transporters are also required to submit quarterly reports pursuant to HSC Section 25160.2(d).

DO NOT WRITE BELOW THIS LINE (FOR DTSC USE ONLY)

Tari L. Patterson
Transportation Unit Representative

June 10, 2013
Received date

TARI L PATTERSON
(Print or type name)

June 30, 2014
Expiration date

JUN 24 2013
DTSC acknowledgement date

DTSC 1299 (7/09)

CALIFORNIA STATE BOARD OF EQUALIZATION

INTERNATIONAL FUEL TAX AGREEMENT (IFTA) LICENSE

Registration Year 2014
Expiration Date 12/31/2014

IFTA ACCOUNT NUMBER CA33075134501
BOE ACCOUNT NUMBER IF STF 59052077

This license is valid until the expiration date above unless canceled or revoked before that date.
A copy of this license must appear in each qualified motor vehicle.

K-VAC ENVIRONMENTAL SERVICES INC
PO BOX 3058
RANCHO CUCAMONGA CA 91729-3058

407910 - 407922

THIS LICENSE IS NON-TRANSFERABLE.

FOR GENERAL TAX QUESTIONS PLEASE TELEPHONE OUR TAXPAYER INFORMATION SECTION AT 800-400-7115 (TTY:711).
FOR INFORMATION ON YOUR RIGHTS, CONTACT THE TAXPAYERS' RIGHTS ADVOCATE OFFICE AT 888-324-2798 OR 916-324-2798.

BOE-442-IFTA REV. 4 (7-11)

Above is your International Fuel Tax Agreement (IFTA) license. This license is issued by the California State Board of Equalization (BOE) under the terms of the International Fuel Tax Agreement (IFTA). This license is valid for qualified motor vehicles operated by the licensee in all IFTA jurisdictions.

This license, or an exact copy of this license, must be carried in the cab of each qualified motor vehicle registered under the California IFTA program. Along with this license, each vehicle must display one set of valid California IFTA decals on the exterior portion of the truck's cab; one decal on each side. In lieu of the IFTA decals, a valid California International Fuel Tax Agreement (IFTA) Temporary Decal Permit (BOE-442-T) may be carried in the cab of the vehicle.

If you do not carry a copy of the IFTA license or do not display the IFTA decals in the required locations on the vehicle(s) (or carry in the cab a valid California IFTA Temporary Decal Permit), it will subject the vehicle operator to the requirement to purchase a fuel trip permit, issuance of a citation and/or imposition of a fine, and possible seizure and sale of the vehicle.

As a holder of this license, you accept certain responsibilities. You must keep adequate records that document the amount of fuel purchased, used, or stored; the amount of fuel tax paid; any fuel use that is exempt from tax; and the number of miles your qualified motor vehicle(s) operated in all IFTA and non-IFTA jurisdictions. Generally, you must keep records for four years.

You must file an IFTA Quarterly Fuel Use Tax Report (IFTA-100/101) no later than the last day of the month following the quarterly reporting period. You must file your report with the exact miles traveled and gallons consumed during the reporting period. You must file your quarterly report even if you did not purchase any fuel or operate your vehicles in any IFTA jurisdiction during the reporting period.

Your license is valid only for the entity named and type of ownership specified (for example, sole proprietorship, corporation, partnership, limited liability company, etc.). You should notify the BOE immediately if you make ownership changes, sell your business, stop operating, or otherwise close your California IFTA license account. Upon closure of your account, you must destroy this license and all copies and remove all related decals issued by the BOE from your vehicles.

This license is valid only if issued by the BOE. Any agent or other person who alters or otherwise produces unauthorized fuel tax credentials is creating fraudulent documents, the use of which may result in civil liability, criminal prosecution or revocation of the license.

If you have any questions, please call the Motor Carrier Office or Taxpayer Information Section at 800-400-7115 (TTY:711). You may also write to the State Board of Equalization, MIC:65, P.O. Box 942879, Sacramento, CA 94279-0065. For general information, visit our website at *www.boe.ca.gov*.

If you would like to know more about your rights as a taxpayer, or if you are unable to resolve an issue with the BOE, please contact the Taxpayers' Rights Advocate office for help by calling 888-324-2798 or 916-324-2798. Their fax number is 916-323-3319.

STATE BOARD OF EQUALIZATION
Motor Carrier Office

"ORIGINAL"

Alliance for Uniform HazMat Transportation Procedures
Uniform Program Credentials

ALLIANCE
For Uniform
HAZMAT
Transportation
Procedures

K-VAC ENVIRONMENTAL SERVICES, INC.
P.O. BOX 3058
RANCHO CUCAMONGA CA 91729

USDOT Census #: 850795
ICC #: 717178
EPA Transportation Ids: CAR000163097
Intrastate Motor Carrier #:

Phone Number to call in case of an accident or emergency: 909-560-0611

Uniform Program ID: UPM-850795-NV

Certified By: DC Donna Chappel

Issuance Date: June 12, 2013 **Expiration June 30, 2014**

Issuing Agency: Nevada Highway Patrol

Agency Phone Number: (775) 684-4622

HAZARDOUS MATERIALS TRANSPORTATION LICENSE

CHP 360H (REV. 1/00) OPI 062

CHP CARRIER NUMBER	LOCATION		
CA 142803		☐ Duplicate ☐ Initial	☐ Replacement ☑ Renewal

LICENSEE NAME AND PHYSICAL ADDRESS *(only if different from below)*

K-VAC ENVIRONMENTAL SERVICES, INC.

8910 ROCHESTER AVENUE
RANCHO CUCAMONGA CA 91730

LICENSEE NAME AND MAILING ADDRESS

K-VAC ENVIRONMENTAL SERVICES, INC.

P.O. BOX 3058
RANCHO CUCAMONGA CA 91729

ATTENTION:

PROPERTY OF THE CALIFORNIA HIGHWAY PATROL (CHP)

The original valid license must be kept at the licensee's place of business as indicated on the license and a legible copy must be carried in any vehicle or combination transporting hazardous materials and must be presented to any CHP officer upon request. This license is NON-TRANSFERABLE and must be surrendered to the CHP upon demand or as required by law. A majority change in ownership or control of the licensed activity shall require a new license. This license may be renewed by submitting an application and appropriate fee to the CHP. Persons whose licenses have expired or are otherwise no longer valid must immediately cease the activity requiring a license. THERE IS NO GRACE PERIOD. For licensing information contact CHP, Commercial Vehicle Section at (916) 843-3400.

This carrier is on the special routing/safe stopping place mailing lists as indicated below:

- ☐ (HMX) Explosives subject to Division 14, California Vehicle Code (CVC).
- ☐ (HMPIH) Poison Inhalation Hazard materials in bulk packagings subject to Division 14.3, CVC.
- ☐ (HRCQ) Highway Route Controlled Quanity radioactive materials subject to Division 14.5, CVC.

Any person who dumps, spills, or causes the release of hazardous materials or hazardous waste upon any highway shall immediately notify the CHP or the agency having jurisdiction for that highway. The minimum fine for failure to make the appropriate notification is $ 2,000.00. (CVC Section 23112.5)

NMFTA
National Motor Freight Traffic Association, Inc.

June 05, 2013

DIANA KNIFER
K-VAC ENVIRONMENTAL SERVICES INC
PO BOX 3058
RANCHO CUCAMONGA, CA 91729

CERTIFICATE OF STANDARD CARRIER ALPHA CODE (SCAC) RENEWAL

The Standard Carrier Alpha Code of **KVES** has been renewed for:

K-VAC ENVIRONMENTAL SERVICES INC
PO BOX 3058
RANCHO CUCAMONGA, CA 91729
EXEMPT
US DOT- 850795

This Alpha Code will apply only to the company name shown above through June 30, 2014. A renewal notice will be mailed approximately one month prior to expiration and must be returned promptly together with payment to ensure its continued validity. Should the company name or address change, please notify the National Motor Freight Association, Inc. at the address above.

Alpha Codes ending with the letter "U" have been reserved for the identification of freight containers. If your Alpha Code ends with the letter "U", it should be used only for this purpose. A non-U ending Alpha Code should be obtained to satisfy other requirements such as company identification for Customs, Electronic Data Interchange, freight payments, etc.

If you participate in the Bureau of Customs and Border Protection (BCBP) automated programs (ACE, AMS,CAFES, FAST, PAPS), your SCAC and related company information has been sent to BCBP electronically and is updated on a nightly basis. If you have encountered a problem using your SCAC with BCBP, or a copy this letter has been requested by BCBP, only then should you forward the requested information (email preferred as a PDF or TIF attachment) to the following address:

CBP SCAC Processing
Bureau of Customs and Border Protection
7681 Boston Blvd., Beauregard 1st Fl Wing A
Springfield, VA 22153
AMS.SCAC@DHS.GOV

NOTICE: Renewal of the above listed SCAC is unrelated to participation in the National Motor Freight Classification (NMFC). Further, it does not confer membership in the National Motor Freight Traffic Association, Inc. nor allow use of the NMFC inconnection with freight rates. For participation and membership information, please call (703) 838-1810

1001 North Fairfax Street, Suite 600 • Alexandria, VA 22314-1798 • ph: 703.838.1810 • fax: 703.683.6296
web: www.nmfta.org • email: nmfta@nmfta.org

STATE OF CALIFORNIA BUSINESS, TRANSPORTATION AND HOUSING AGENCY

DEPARTMENT OF MOTOR VEHICLES
MOTOR CARRIER SERVICES BRANCH MS G875
P.O. BOX 932370 Sacramento, CA. 94232-3700
(916) 657-8153

02/04/2009

K VAC ENVIROMENTAL SERVICES INC
PO BX 3058
RANCHO CUCAMONGA, CA 91729

RECEIVED
FEB 1 1 2009
BY:_____

A Public Service Agency

NON-EXPIRING MOTOR CARRIER PERMIT
Combined Carrier

Valid From:	02/03/2009	Valid Through:	Non-Expiring
CA#:	0142803		

DEPARTMENT OF MOTOR VEHICLES
Motor Carrier Services Branch
P.O. BOX 932370 Sacramento, CA. 94232-3700

K VAC ENVIROMENTAL SERVICES INC
PO BX 3058
RANCHO CUCAMONGA, CA 91729

The carrier named on this permit is subject to the Unified Carrier Registration Act (UCRA) of 2005, and is granted a non-expiring permit of the following classification:

For Hire
Corporation

Not Valid for Intrastate Only Operations

Pmt Date:	N/A	Office #:	154
Account #:	34335	Tech ID:	##
Sequence #:	#NNN	Amt Paid:	No Fee

!!!IMPORTANT REMINDERS!!!

1. This non-expiring Motor Carrier Permit (MCP) will remain valid as long as you continue to conduct interstate operations. The Unified Carrier Registration Act (UCRA) of 2005 exempts combined carriers (carriers who operate both intra and interstate) from MCP requirements.
2. Federal Motor Carrier Safety Administration insurance requirements must be maintained.
3. If you commence intrastate only operations, you must renew your MCP.

California Relay Telephone Service for the deaf or hearing impaired from TDD Phones: 1-800-735-2929; from Voice Phones: 1-800-735-2922

DMV 2200 MCP (NEW 10/2007) *A Public Service Agency*

HAZARDOUS MATERIALS TRANSPORTATION LICENSE

CHP 360H (REV. 1/00) OPI 062

CHP CARRIER NUMBER	LOCATION		
CA 142803		☐ Duplicate ☐ Initial	☐ Replacement ☑ Renewal

LICENSEE NAME AND PHYSICAL ADDRESS *(only if different from below)*

K-VAC ENVIRONMENTAL SERVICES, INC.

8910 ROCHESTER AVENUE
RANCHO CUCAMONGA CA 91730

LICENSEE NAME AND MAILING ADDRESS

K-VAC ENVIRONMENTAL SERVICES, INC.

P.O. BOX 3058
RANCHO CUCAMONGA CA 91729

ATTENTION:

PROPERTY OF THE CALIFORNIA HIGHWAY PATROL (CHP)

The original valid license must be kept at the licensee's place of business as indicated on the license and a legible copy must be carried in any vehicle or combination transporting hazardous materials and must be presented to any CHP officer upon request. This license is NON-TRANSFERABLE and must be surrendered to the CHP upon demand or as required by law. A majority change in ownership or control of the licensed activity shall require a new license. This license may be renewed by submitting an application and appropriate fee to the CHP. Persons whose licenses have expired or are otherwise no longer valid must immediately cease the activity requiring a license. THERE IS NO GRACE PERIOD. For licensing information contact CHP, Commercial Vehicle Section at (916) 843-3400.

This carrier is on the special routing/safe stopping place mailing lists as indicated below:

- ☐ (HMX) Explosives subject to Division 14, California Vehicle Code (CVC).
- ☐ (HMPIH) Poison Inhalation Hazard materials in bulk packagings subject to Division 14.3, CVC.
- ☐ (HRCQ) Highway Route Controlled Quanity radioactive materials subject to Division 14.5, CVC.

Any person who dumps, spills, or causes the release of hazardous materials or hazardous waste upon any highway shall immediately notify the CHP or the agency having jurisdiction for that highway. The minimum fine for failure to make the appropriate notification is $ 2,000.00. (CVC Section 23112.5)

STATE OF CALIFORNIA

DEPARTMENT OF RESOURCES RECYCLING AND RECOVERY

REGISTERED

WASTE TIRE HAULER

K-VAC Enviromental Services Inc.
P.O Box 3058
Rancho Cucamonga, CA 91729

ISSUED BY:

Carol Mates

EXECUTIVE DIRECTOR

VEHICLE LICENSE PLATE NUMBER:	VP60585
DECAL SERIAL NUMBER:	14-00642
ISSUE DATE:	November 5, 2013
EXPIRATION DATE:	December 31, 2014
CALRECYCLE TPID NUMBER:	1705986

FOR QUESTIONS CONCERNING THIS REGISTRATION, PLEASE CALL (866) 896-0600

ONLY ORIGINAL REGISTRATION VALID

DO NOT COPY OR REPRODUCE

State Of California
CONTRACTORS STATE LICENSE BOARD
ACTIVE LICENSE

Consumer Affairs

License Number **977254** Entity CORP

Business Name K - VAC ENVIRONMENTAL SERVICES INC

Classification(s) A C21 HAZ

Expiration Date 09/30/2014 www.cslb.ca.gov

PERMIT

NON-TRANSFERABLE

Expires: 12/31/2014

This permit may be suspended or revoked by the Department of Public Health Environmental Health Services for cause. This permit is granted on the condition that the permittee will comply with the laws, ordinances, and regulations that are now or may hereafter be in force by the United States Government, the State of California, and the County of San Bernardino pertaining to the below mentioned business. Penalty fees are assessed on permits renewed 30 days after expiration date indicated above, or for failure to obtain new permit in case of transfer of ownership.

The Business Owner is responsible for timely renewal. Not receiving a renewal notice for any reason does not mitigate responsibility for timely payment. If not paid within 30 days of the expiration date shown, a 25% penalty will be imposed. Failure to correct violations cited on an inspection report, by the noted compliance date, shall necessitate an additional re-inspection at a charge of $61.25 per 15 minutes with a minimum time of 30 minutes, and a minimum charge of $122.50.

K-VAC ENVIROMENTAL
PO BOX 3058
RANCHO CUCAMONGA, CA 91729

OWNER OF RECORD: **KNIFER FRED / DIANA**
REGULATED FACILITY: FA0011959
FACILITY LOCATION: K-VAC ENVIROMENTAL INC
8910 ROCHESTER AV
RANCHO CUCAMONGA, CA 91730

Item #	Prog Element	General Health Program Description	Permit #	Program #
1	2706	2706 Liquid Wst Hauling/Disposal Each Vehicle	PT0000633	PR0000633

TOTAL FEE PAID: 768.00

MUST BE POSTED IN A CONSPICUOUS PLACE AT THE PERMITTED FACILTY. ISSUANCE OF THIS PERMIT DOES NOT IMPLY APPROVAL. FOOD FACILITIES MUST POST ENTIRE PAGE.

THIS IS NOT AN INVOICE

Division Chief
DIVISION OF ENVIRONMENTAL HEALTH SERVICES

DEPARTMENT OF PUBLIC HEALTH ENVIRONMENTAL HEALTH SERVICES
335 N. Arrowhead Ave, 2nd Floor, San Bernardino, CA 92415-0160 - (800) 442-2283 - FAX (909) 387-4323 - www.sbcounty.gov/dehs

COUNTY OF SAN BERNARDINO

Did you know that San Bernardino County restaurant grades are on-line? Visit our website at www.sbcounty.gov/dehs and check out your favorite eatery.

SAN BERNARDINO COUNTY CUPA
CERTIFIED UNIFIED PROGRAM AGENCY
ANNUAL PERMIT

EP AP 3 AR 0.00

K-VAC ENVIRONMENTAL SERVICES INC
P.O. BOX 3058
RANCHO CUCAMONGA, CA 91729

This Unified Permit is hereby issued to:
K-VAC ENVIRONMENTAL
SERVICES INC
8866 1/2 WHITE OAK
RANCHO CUCAMONGA, CA 91730

Permit is issued to Facility: FA0013296 for a period not to exceed one year from effective date.

Effective Date: 10/1/2013 **Expiration Date: 9/30/2014**

Permit Number	Program Element	Related ID
PT0023678	4242 HAZARDOUS MATERIALS 1-3 CHEMICALS	PR0031105
PT0028151	4453 SMALL QUANTITY GENERATOR	PR0037033
PT0028153	5012 CUPA ANNUAL ADMIN PERMIT PROGRAM FEE-LEVEL 2	PR0037035

Permitted by:
San Bernardino County CUPA
620 South "E" Street
San Bernardino, CA 92415-0153
(909) 386-8401

Michael A. Horton

Mike Horton, Fire Marshal

THIS PERMIT IS NOT TRANSFERABLE AND IS ISSUED CONDITIONALLY UPON ADHERENCE TO THE REQUIREMENTS LISTED ON THE BACK OF THIS PERMIT. THIS FORM MUST BE DISPLAYED CONSPICUOUSLY ON THE PREMISES.

RPT APERM962-638 Rev. 2/14 Printed on: 5:05:26PM 4/2/2014

CUPA PERMIT CONDITIONS

As a condition of the Certified Unified Program Agency (CUPA) permit to operate, the owner, operator, and permit holder shall comply with the following:

a. **Hazardous Materials Release Response Plans and Inventories Program (HMRRP):** California Health and Safety Code (CHSC) Division 20, Chapter 6.95, Article 1 and Title 19 California Code of Regulations (CCR).

b. **California Accidental Release Prevention Program (CalARP):** CHSC Division 20, Chapter 6.95, Article 2 and Title 19 CCR.

c. **Underground Storage Tanks (USTs):** CHSC Division 20, Chapters 6.5, 6.7 and Title 23 CCR, Chapter 16.

   (1) Monitoring, Response and Plot Plans shall be approved by the San Bernardino County CUPA.

   (2) The owner and operator are subject to all applicable requirements of Chapter 6.7 of the CHSC and the applicable regulations.

   (3) This permit and permit conditions including the Monitoring, Response and Plot Plans shall be maintained on site.

   (4) Monitoring or programming for monitoring shall be conducted at the locations of the following UST equipment, if installed: monitoring system control panels; sensors monitoring tank annular spaces, sumps, dispenser pans, spill containers, or other secondary containment areas (e.g. double-walled piping); mechanical or electronic line leak detectors; and in-tank liquid level probes used for leak detection.
   Note: The UST ID Number is listed on the front of the permit for each UST.

d. **Aboveground Petroleum Storage Act SPCC Plans:** CHSC Division 20, Chapter 6.67 and 40 CFR 112.

e. **Hazardous Waste Generator and Hazardous Waste Onsite Treatment:** CHSC Division 20, Chapter 6.5 and Title 22 CCR, Division 4.5, Chapters 10, 11, 12, 20 and 31.

f. **San Bernardino County Fire Protection District Code (SBCFPD FC), Hazardous Materials Management Plans and Inventories:** CHSC Division 12, Part 2, Chapter 1, Article 2, Section 13143.9, CHSC Division 20, Chapter 6.95, Article 1, Section 25504, **SBCFPD FC** Chapter 4, Section 407.5, Section 407.6, Chapter 50, Section 5001.5.1 and Section 5001.5.2.

g. **Unified Program Forms and Electronic Reporting:** CHSC Division 20, Chapter 6.11, Section 25404(e)(4) and Title 27 CCR.

NOTICE OF VERIFICATION AND CERTIFICATION

MAY 7, 2012

MARGARET HOYOS
K-VAC ENVIRONMENTAL SERVICES, INC
P.O. BOX 3058
RANCHO CUCAMONGA, CA 91729

CHS Verification Order Number: 12020154

Congratulations, the Supplier Clearinghouse is pleased to inform you that in accordance with General Order 156, your business enterprise has successfully completed the verification process, and your company has received the following certification: **WMBE**

Your company will now be recognized by the Joint Utilities as a women and/or minority-owned business when competing for procurements by public utilities participating in the Utility Supplier Diversity Program.

Your Certification is valid for three years and you are required to re-verify your company's WMBE status at least 30 days prior to your expiration date. Please notify our office of any change in your address or contact information so that we can maintain your most current contact information. You must notify our office of any change in ownership and/or control of your company within 30 days of the change. Failure to provide that notification is in violation of section 8285 of the Public Utilities Code and could render your certification status invalid.

If your company was verified and certified under the CAV (Comparable Agency Verification) process, your certificate status will expire on the same expiration date as that of the comparable agency. However, please note that the maximum verified certification period for the Supplier Clearinghouse is three years regardless of ***any*** CAV expiration date in excess of three years.

The Supplier Clearinghouse may request additional information or conduct an on-site visit at any time during the term of your verified certification status. The Supplier Clearinghouse may reconsider your certification status and possibly rule invalid your verified status if it is determined that the status was knowingly obtained by false, misleading and/or incorrect information. Also note that if in a formal opinion, the California Public Utilities Commission determines that the WMBE verification criteria under which you were deemed eligible is no longer valid, then your status may change or you may be required to comply with the change to maintain eligibility.

Thank you for participating in the Utility Supplier Diversity program. We wish you much success in your business endeavors. Feel free to contact our office if you have questions, or visit our website at **www.thesupplierclearinghouse.com.**

THE SUPPLIER CLEARINGHOUSE

SUPPLIER CLEARINGHOUSE
CERTIFICATE OF ELIGIBILITY

CERTIFICATE EXPIRATION DATE: **05-07-2015**

The Supplier Clearinghouse for the Utility Supplier Diversity Program of the California Public Utilities Commission hereby certifies that it has audited and verified the eligibility of:

K- VAC Environmental Services, Inc.
of Rancho Cucamonga, California as a WMBE

pursuant to Commission General Order 156, and the terms and conditions stipulated in the Verification Application Package. This Certificate shall be valid only with the Clearinghouse seal affixed hereto.

Eligibility must be maintained at all times, and renewed within 30 days of any changes in ownership or control. Failure to comply may result in a denial of eligibility. The Clearinghouse may reconsider certification if it is determined that such status was obtained by false, misleading or incorrect information. Decertification may occur if any verification criterion under which eligibility was awarded later becomes invalid due to Commission ruling. The Clearinghouse may request additional information or conduct on- site visits during the term of verification to verify eligibility.

This certification is valid only for the period that the above named firm remains eligible as determined by the Clearinghouse. Utility companies may direct inquiries concerning this Certificate to the Clearinghouse at 800-359-7998 in Los Angeles.

VON: 12020154 ***Determination Date: 05-07-2012***

Los Angeles Unified School District

Procurement

October 19, 2012

Owners
Diana S. Knifer
Fred G. Knifer
K-Vac Environmental Services, Inc.
8910 Rochester Avenue
Rancho Cucamonga, CA 91730

Re: Certification of Small Business Enterprise (SBE) Status

Dear Business Owners:

Thank you for submitting your application for Small Business Enterprise (SBE) certification to the Los Angeles Unified School District (LAUSD). Per our evaluation of the information you provided in your application and the North American Industry Classification System code you identified, your status as an SBE with LAUSD has been approved for the term specified below. LAUSD is pleased to issue this SBE certificate subject to the following conditions:

NAICS code(s) for which SBE status is recognized: 562112

SBE Certificate Effective Date: 10/19/2012

SBE Certificate Expiration Date: 10/19/2015

Work performed by your firm that falls within the above referenced NAICS code(s) will be counted as SBE participation for work performed on LAUSD contracts. To maintain a valid SBE Certificate after three years with LAUSD, you must renew your self-certification with LAUSD or register with the Small Business Administration before the SBE certification expiration date referenced above expires.

LAUSD reserves the right to withdraw this certification if at any time it is determined that certification was knowingly obtained by false, misleading or incorrect information. LAUSD reserves the right to audit all statements. If any firm attempts to falsify or misrepresent information to obtain certification, LAUSD may, in its sole discretion, disqualify this firm from participation in an LAUSD contracts for a period of up to five years.

This SBE certification is recognized by the Metropolitan Water District of Southern California and its reciprocating agencies according to the same terms and conditions. If there are any changes in your status that may impact your certification, you are required to notify the LAUSD Small Business Program Office immediately at (213) 241-4973.

Sincerely,

Kimberly Frelow
Manager, Small Business Program

Los Angeles Unified School District -Procurement
333 S. Beaudry Ave., 21st Floor, Los Angeles, CA 90017
Telephone (213) 241-4973 • Fax (213) 241-6845

Department of General Services
BUILDING GREEN · BUYING GREEN · WORKING GREEN

K-VAC ENVIRONMENTAL SERVICES INC - #1768427

SUPPLIER PROFILE

Legal Business Name	K-VAC ENVIRONMENTAL SERVICES INC		
Doing Business As	K-VAC ENVIRONMENTAL SERVICES INC		
Address	PO BOX 3058 RANCHO CUCAMONGA, CA 91729	Phone FAX	(909) 476-2308 (909) 476-2408
Email	diana.knifer@kvacenv.com		
Web Page	http://www.kvacenv.com		
Business Types	Service		
Service Areas	Alameda, Fresno, Imperial, Inyo, Kern, Los Angeles, Merced, Monterey, Napa, Orange, Riverside, Sacramento, San Benito, San Bernardino, San Diego, San Francisco, San Joaquin, San Luis Obispo, San Mateo, Santa Barbara, Santa Clara, Santa Cruz, Ventura,		
Keywords	BULK TRANSPORTATION, ENVIRONMENTAL SERVICES, HAZARDOUS WASTE DISPOSAL, NONHAZARDOUS WASTE DISPOSAL, SLUDGE DISPOSAL, HAZARDOUS WASTE HAULING, NONHAZARDOUS WASTE HAULING, REMEDIATION & CLEAN UP, COLLECTION SERVICES		
Classifications	761216 - Nonhazardous waste disposal 761219 - Hazardous waste disposal 771115 - Environmental safety services 771116 - Environmental rehabilitation		

Active Certifications

TYPE	STATUS	FROM	TO
SB	Approved	Feb 13, 2014	Feb 28, 2017

Certification History

TYPE	STATUS	FROM	TO
SB	Expired	Feb 20, 2013	Feb 28, 2014
SB	Expired	Feb 22, 2012	Feb 28, 2013

NETConnect Connecting you to Government Bids throughout Southern California

Certified Small Business Enterprise

Vendor Account Number: 167629

Diana Knifer
K-VAC Environmental
P O BOX 3058
Rancho Cucamonga, CA 91729

Thank you for submitting your Vendor Application seeking Small Business Enterprise recognition with the Coalition of Southern California Public Agencies. Per our evaluation of the information you provided in your application and the North American Industry Classification System codes you identified, your status as a Small Business Enterprise (SBE) has been approved. This certification is recognized by the following organizations:

Metropolitan Water District of Southern California
San Diego County Water Authority
Minority Business Development Agency
Los Angeles Unified School District
Port of Los Angeles
Los Angeles Community College District

Metropolitan is pleased to issue this SBE Certificate subject to the terms and conditions identified below:

NAICS code(s) for which SBE status is recognized: 562219,562119
SBE Certificate Effective Date: 07/11/11
SBE Certificate Expiration Date: 07/05/14

Work Performed by your firm that falls within the above-mentioned NAICS code(s) will be counted as SBE participation for work performed on contracts procured by the above agencies.

The agencies reserve the right to withdraw this certification if at any time it is determined that certification was knowingly obtained by false, misleading or incorrect information and reserve the right to audit all statements. If any firm attempts to falsify or misrepresent information to obtain certification, the firm may be disqualified from participation in any contracts for a period of up to five years.

SBE Certification is valid for a period of three (3) years. To maintain SBE status, firms must update their existing SBE Vendor Application on or before the expiration date mentioned above. All information is subject to verification.

If there are any changes in your status that may impact your certification, you are required to update your account information online. A copy of your information can be viewed by logging into your Vendor Profile, and visiting the Small Business Certification tab.

Sincerely,
John J. Arena
Metropolitan Water District of Southern California
Business Outreach Program Manager

700 N. Alameda Street, Los Angeles, California 90012 Mailing Address: Box 54153, Los Angeles, CA 90054-0153 Telephone (213) 217-7444

Department of Toxic Substances Control

Deborah O. Raphael, Director
8800 Cal Center Drive
Sacramento, California 95826-3200

Matthew Rodriquez
Secretary for
Environmental Protection

Edmund G. Brown Jr.
Governor

HAZARDOUS WASTE TRANSPORTER REGISTRATION

NAME AND ADDRESS OF REGISTERED TRANSPORTER:

M P ENVIRONMENTAL SERVICES, INC.
3400 MANOR STREET
BAKERSFIELD, CA 93308
TRANSPORTER REGISTRATION NO.: 2895

EXPIRATION DATE: MAY 31, 2015

THIS IS TO CERTIFY THAT THE FIRM NAMED ABOVE IS DULY REGISTERED TO TRANSPORT HAZARDOUS WASTE IN THE STATE OF CALIFORNIA IN ACCORDANCE WITH THE PROVISIONS OF CHAPTER 6.5, DIVISION 20 OF THE HEALTH AND SAFETY CODE AND TITLE 22 OF THE CALIFORNIA CODE OF REGULATIONS, DIVISION 4.5.

THIS REGISTRATION CERTIFICATE MUST BE CARRIED WITH EACH SHIPMENT OF HAZARDOUS WASTE.

FOR REGISTRATION INFORMATION, PLEASE CALL (916) 440-7145.

Janet K. Chase-McCoy
(AUTHORIZED SIGNATURE)

05/29/2014
(DATE)

STATE OF CALIFORNIA
DEPARTMENT OF CALIFORNIA HIGHWAY PATROL

HAZARDOUS MATERIALS TRANSPORTATION LICENSE

CHP 360H (REV. 1/00) OPI 062

CONTROL NUMBER	LICENSE NUMBER	ISSUE DATE	EFFECTIVE DATE	EXPIRATION DATE
209796	88988	12/6/2013		5/31/2015

CHP CARRIER NUMBER	LOCATION		
CA 78424		☐ Duplicate	☐ Replacement
		☐ Initial	☑ Renewal

LICENSEE NAME AND PHYSICAL ADDRESS *(only if different from below)*

M. P. ENVIRONMENTAL SERVICES, INC.

LICENSEE NAME AND MAILING ADDRESS

M. P. ENVIRONMENTAL SERVICES, INC.

3400 MANOR STREET
BAKERSFIELD CA 93308

ATTENTION: GINA BLANKENSHIP

PROPERTY OF THE CALIFORNIA HIGHWAY PATROL (CHP)

The original valid license must be kept at the licensee's place of business as indicated on the license and a legible copy must be carried in any vehicle or combination transporting hazardous materials and must be presented to any CHP officer upon request. This license is NON-TRANSFERABLE and must be surrendered to the CHP upon demand or as required by law. A majority change in ownership or control of the licensed activity shall require a new license. This license may be renewed by submitting an application and appropriate fee to the CHP. Persons whose licenses have expired or are otherwise no longer valid must immediately cease the activity requiring a license. THERE IS NO GRACE PERIOD. For licensing information contact CHP, Commercial Vehicle Section at (916) 843-3400.

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- ☐ (HRCQ) Highway Route Controlled Quanity radioactive materials subject to Division 14.5, CVC.

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SOIL and WATER- 1 - DRAINAGE EROSION AND SEDIMENTATION CONTROL PLAN (DESCP)

Verification: No later than thirty (30) days prior to start of site mobilization, the Project owner shall submit a copy of the final DESCP to the CPM for review and comment and to the County of Riverside and the CRBRWQCB if required.
The CPM shall consider comments if received by the county and CRBRWQCB before approval of the DESCP.
The DESCP shall be consistent with the grading and drainage plan as required by Condition of Certification **CIVIL-1**, and relevant portions of the DESCP shall clearly show approval by the chief building official. The Project owner shall provide in the monthly compliance report with a narrative on the effectiveness of the drainage, erosion, and sediment-control measures and the results of monitoring and maintenance activities. Once operational, the Project owner shall update and maintain the DESCP for the life of the Project and shall provide in the annual compliance report information on the results of monitoring and maintenance activities.

Channel Maintenance Plan
Inspection Log After a Storm Event

Results of storm event	Date	Inspector Initials	Comments	Evidence Y/N	Area Normal Check Y/N
Did significant damage occur? If so note area.	8/3/2014	CM	No significant damage. There were areas of erosion that was mitigated. See pictures attached.	Y	Y
Any evidence to public safety?	8/4/2014	CM	No safety issues to the public.	N	Y
Was there negative affected groundwater recharge	8/5/2014	CM	There was no negative disturbance	N	Y
Were there negative hazards to wildlife?	8/6/2014	CM	There was no negative hazard to wildlife	N	Y
	9/3/2014	CM	Netting around the north and south pond incurred significant damage. Agencies were notified.		

Repairs to erosion at the northwest end of Unit 1 was noted and repaired. See photos.

GENESIS SOLAR ENERGY

Contract #: A4PA
Report No: 0-CA-0-00-03

SOLAR FIELD
DRAINAGE, EROSION AND SEDIMENT CONTROL PLAN (DESCP)

Rev. No.	Date	Sheet Number	By	Checked	Approved
A	28 Feb 2011	ALL	H. Chang	S. Aguilera	G. Pai
B	11 Apr 2011	ALL	H. Chang	S. Aguilera	G. Pai

(DESCP)

DRAINAGE, EROSION AND SEDIMENT CONTROL PLAN

Table of Contents

Section

(DESCP)

DRAINAGE, EROSION AND SEDIMENT CONTROL PLAN

This Drainage, Erosion & Sediment Control Plan (DESCP) was prepared in response to C.9.13 Proposed Condition/Mitigation Measures, Soil&Water-1, as required by the Genesis Solar Energy Project (09-AFC-8), Consolidated Conditions of Certification.

1.0 PROJECT OVERVIEW

Genesis Solar, LLC is proposing to construct, own and operate the Genesis Solar Energy Project near Ford Dry Lake on Bureau of Land Management (BLM) administrative lands in Riverside County, California. The Project Site is located in the Colorado Desert between the communities of Blythe, CA (approximately 25 miles east) and Desert Center, CA (approximately 27 miles west). The facility is a 250 megawatt (MW) solar thermal power generating plant.

The Site covers approximately 1,800 acres of federal land managed by the BLM. Surrounding land uses include Interstate 10 (I-10) to the south, the Palen McCoy Wilderness to the north, the Palen Dry Lake Area of Critical Environmental Concern (ACEC) to the west and open unrestricted access lands to the east. Most of the land near the Site is managed by BLM and there is no California State Land in the vicinity, but there are substantial private holdings.

The Project Site is situated within the Chuckwalla Valley. It is relatively flat, sloping from north to south, with Site elevations of approximately 400 to 370 feet above mean sea level. The Site is occupied by a community of low creosote and bursage scrub vegetation and covers portions of the Ford Dry Lake and McCoy Spring USGS topographic maps.

The first phase of construction will consist of the main access road running northwest from the Wiley's Well exit off I-10 to the project site, north of Ford Dry Lake. Phase 2 will consist of the westernmost solar field and power block and phase 3 will consist of the easternmost solar field and power block. This Drainage, Erosion and Sediment Control Plan (DESCP) covers both solar fields and power blocks phases 2 and 3.

2.0 DRAINAGE

Natural drainage across the Project Site is episodic; flow changes at usually irregular intervals, is shallow and occurs over a broad area primarily as sheet flow or in shallow washes. A number of ephemeral washes traverse the site as dry streambeds, which will flow after significant rainfall. The Site has been historically used for both off-highway vehicles and sheep grazing; however neither activity currently occurs. Surface water generally flows northeast to southwest, from the Palen and McCoy mountains thru the Chuckwalla Valley to the Ford Dry Lake.

The proposed Genesis Solar Energy Project (GSEP) plant is situated within the Chuckwalla Valley. Trapezoidal diversion channels with typical channel bank slopes of 3:1, and conveyance capacity of 100 year 24 hour rainfall frequency were selected for the design. Top of the inner channel banks are minimum 2 foot higher than outer channel banks. This was designed to protect the GSEP site against flooding. The channel details and configurations are shown on attached construction drawings. The main purpose of the channels is to divert incoming upstream flow and convey the flood water to the south of the project. In the event of the channel over running the outer banks, flows would continue on the outer existing grade, and around the solar fields in the direction of the Ford Dry Lake.

The resulting peak discharges from the hydrology computation are used for the channel design, and flow is released from the southern channel in a manner which reasonably mimics existing conditions with respect to flow

depth and velocity, and does not result in erosion downstream of the facility. A computer simulation using FLO-2D is attached as a separated document.

3.0 OFF-SITE HYDROLOGY

During a 100-year event the GSEP site is protected from flooding by providing diversion channels with capacity to convey the offsite flood water around the site, southerly to mimic closely the existing condition. With this in mind, the GSEP offsite Hydrology Map (attached) shows the basin characteristics, drainage areas and drainage boundaries including the layout of the diversion channels, the West Channel, North-South Channel, and East Channel. The hydrology for the outer site diversion channel drainage calculation, and sizing selection were provided for the 100-yr 24-hr rainfall. Rainfall depths for the 5-, 10-, 25- and 100-year 24-hour rainfall events were determined to be 1.61 inches, 2.00 inches, 2.56 inches, and 3.51 inches, respectively, based on the National Oceanic and Atmospheric Administration's (NOAA) Precipitation-Frequency Atlas of the United States (NOAA Atlas No. 14). The design criteria from the Riverside County Flood Control and Water Conservation District hydrology manual, unit hydrograph method was used to determine the peak discharges at specific locations of the GSEP site. (See the Revised Project Drainage Report for detail computations)

The channels are designed to contain the 100-year storm event within the channel banks. As shown below, there are four channels on site which have the following flows during the 100-year event:

TABLE I

Offsite Stormwater Flow Rate (cfs)	
West - Channel A	3,800
North South - Channel B	2,624
North South - Channel C	2,624
North South - Channel B/C	5,247
East - Channel D	21,690

All runoff diversion channels will be designed with a soil/cement mix or similar surface to prevent erosion by providing adequate protection against development of a controlled low-flow thalweg. The channels are designed with appropriate depth to width ratios and slope erosion control to prevent undercutting and head cutting within the channel.

4.0 ON-SITE HYDROLOGY

In the Solar fields the On-Site drainage was computed for the 10-year, 24-hr storm using Natural Resources Conservation Service (NRCS) TR-55, from USDA. Technical Release 55 (TR-55) presents simplified procedures for estimating runoff and peak discharges in small watersheds from 300 to 2,000 acres. For detailed procedures and methods in using NRCS TR-55 for peak discharge analysis reference Technical Release TR-55 "Urban Hydrology for Small Watersheds", United States Department of Agriculture, Natural Resources Conservation Service. The summary of the peak discharges for the 10-year frequency are included in the Revised Project Drainage Report.

(DESCP)

DRAINAGE, EROSION AND SEDIMENT CONTROL PLAN

5.0 SITE GRADING

Minimal grading will be performed in the solar field. The site will be terraced to minimize cut and fill and earth moving; final graded surface will be at 0.18% slope east to west. The Solar Fields are terraced in the north-south direction as depicted on construction drawings, and a portion of the west corner of the lowest terrace will also serve as a retention and water quality basin. Details are shown on the construction drawings.

TABLE II
Anticipated Grading Quantities, in cubic yard

	Cut	Fill	Import	Export
Solar Unit 1	944,360	944,360	0	0
Solar Unit 2	1,380,140	1,380,140	0	0

This includes 20% shrinkage and 0.25 ft subsidence

Clearing and grubbing will occur inside the entire GSEP site property limits, except for a small area located in the west south-west portion of the Solar Unit 1, which is depicted as Environmentally Sensitive Areas, will be left undisturbed. No fill is anticipated for the site, but in the event fill is required, material present on-site is expected to be adequate. Where there are proposed interior plant roads, subgrade will be compacted to provide a stable construction roadway. The earthworks process will be undertaken using standard contractor equipment, with dozers, elevating scrapers, hydraulic excavators, tire loaders, compacting rollers, and dump trucks. Where clearing is required to facilitate construction, but no grading or roads are required, vegetation will be mowed and allowed to re-grow after construction.

6.0 EROSION CONTROL

To control the discharge south of the Solar Unit 1 and Solar Unit 2, graded outlet control detention/sediment basin is provided. Hydraulic analysis is provided using FLO-2D computer modeling, and the results are shown on the FLO-2D report and the discharge from outlets mimic the pre-development conditions. (Refer to the FLO-2D computation report)

Erosion control with appropriate BMPs is placed in various areas, especially in the diversion channels for bank protection against bank and toe scouring. A set of erosion control plans is being prepared to be submitted with the construction drawing package. Temporary and permanent erosion BMPs are shown on detailed construction drawings.

Soil Wind and Water Erosion Control that will be provided to the construction site include, but are not limited to, the following BMPs:

EC-1 Scheduling

EC-2 Preservation of Existing Vegetation

EC-5 Soil Binders

EC-9 Earth Dikes and Drainage Swales

EC-10 Flow Velocity Dissipation Devices

EC-12 Steam Bank Stabilization

SE-1 Silt Fence

SE-2 Sediment Basin

SE-3 Sediment Trap

SE-4 Check Dam

SE-8 Sand Bag Barrier

SE-10 Storm Drain Inlet Protection

WE-1 Wind Erosion Control

TC-1 Stabilized Construction Entrance/Exit

TC-2 Stabilized Construction Roadway

7.0 ON-SITE CONTACT INFORMATION

Resident Engineer
Rob K Holt, PE
Principal Engineer
201 E. Hobson Way,
Blythe, CA 92225
Office - (760) 922-4658

Emergency Contact Information
Gurudas M. Pai, PE
Lead Civil/Structural Engineer
47 Discovery, Irvine, CA 92618
Office - (949) 349-5994

8.0 CONSTRUCTION MONITORING PROGRAM

During the raining season the resident engineer will monitor erosion control measures set by the DESCP and design drawings on a daily basis at the beginning of each working day, when forecast precipitation exceeds 35% chance of occurrence.

The Maintenance schedule including post-construction maintenance of structural control BMPs will be discussed in the Project Monitoring Plan.

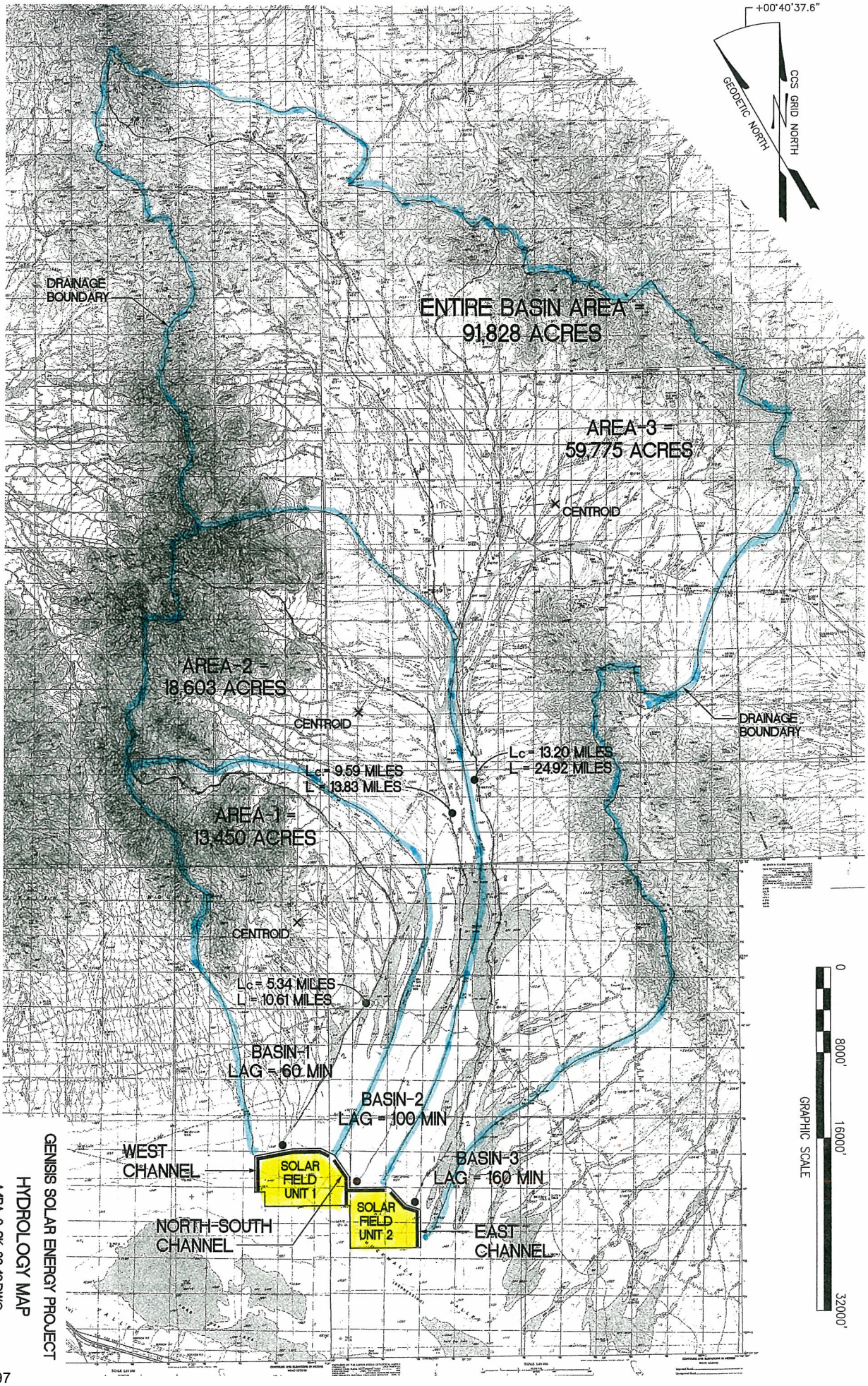
9.0 ATTACHMENTS

- Exhibit “A” Site Vicinity Map with linear facilities

(DESCP)

DRAINAGE, EROSION AND SEDIMENT CONTROL PLAN

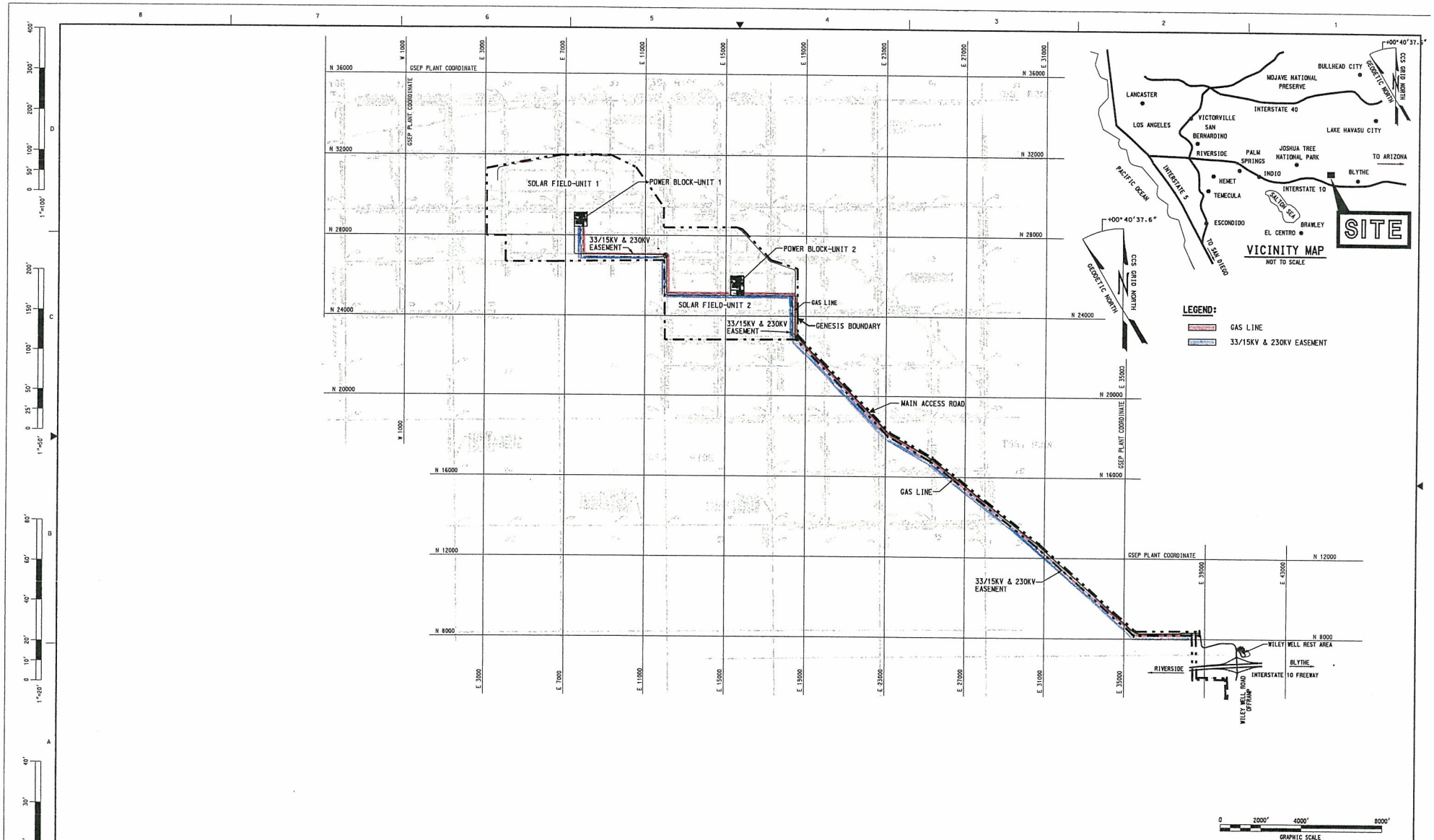
- Exhibit “B” Site Delineation Map
- Exhibit “C” Diversion Channel Allocation
- Exhibit “D” Onsite Hydrology Map Unit 1
- Exhibit “E” Onsite Hydrology Map Unit 2
- EPCC Construction Schedule
- Worker Safety Dust Control Plan
- Air Quality Construction Mitigation Plan



GENISIS SOLAR ENERGY PROJECT

HYDROLOGY MAP

A4PA-0-SK-00-16.DWG



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REGISTERED PROFESSIONAL ENGINEER GURDAS M. PAI C29561 EXP. 3/31/11 CIVIL STATE OF CALIFORNIA

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CIVIL ENGINEER

FLUOR. Genesis Solar LLC

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DESIGNED BY LS		
CHECKED BY HC		
SUPERVISOR HC	APP DATE	
LEAD ENGR/SPEC. GP	APP DATE	
FLUOR	APP DATE	
CLIENT	APP DATE	

Genesis Solar Energy Project
Riverside County, California

SITE VICINITY MAP
EXHIBIT "A"

SCALE 1" = 2000' | DRAWING NUMBER A4PA-0-SK-0-00-34 | REV A

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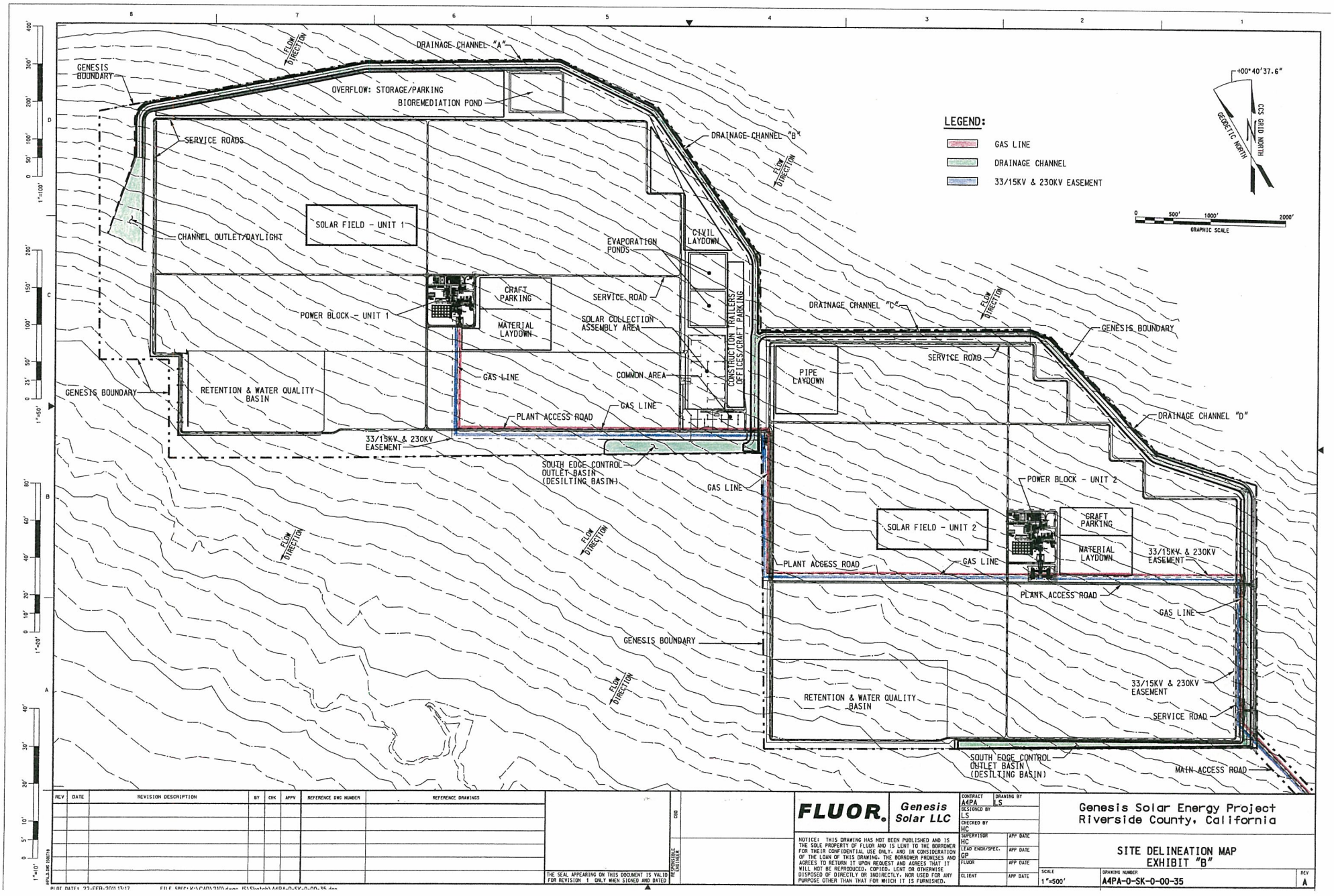

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RECOMMENDED FOR APPROVAL

FLUOR. Genesis Solar LLC

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LEAD ENGR/SPEC. GP		APP DATE
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CLIENT		APP DATE

Genesis Solar Energy Project
Riverside County, California

SITE DELINEATION MAP
EXHIBIT "B"

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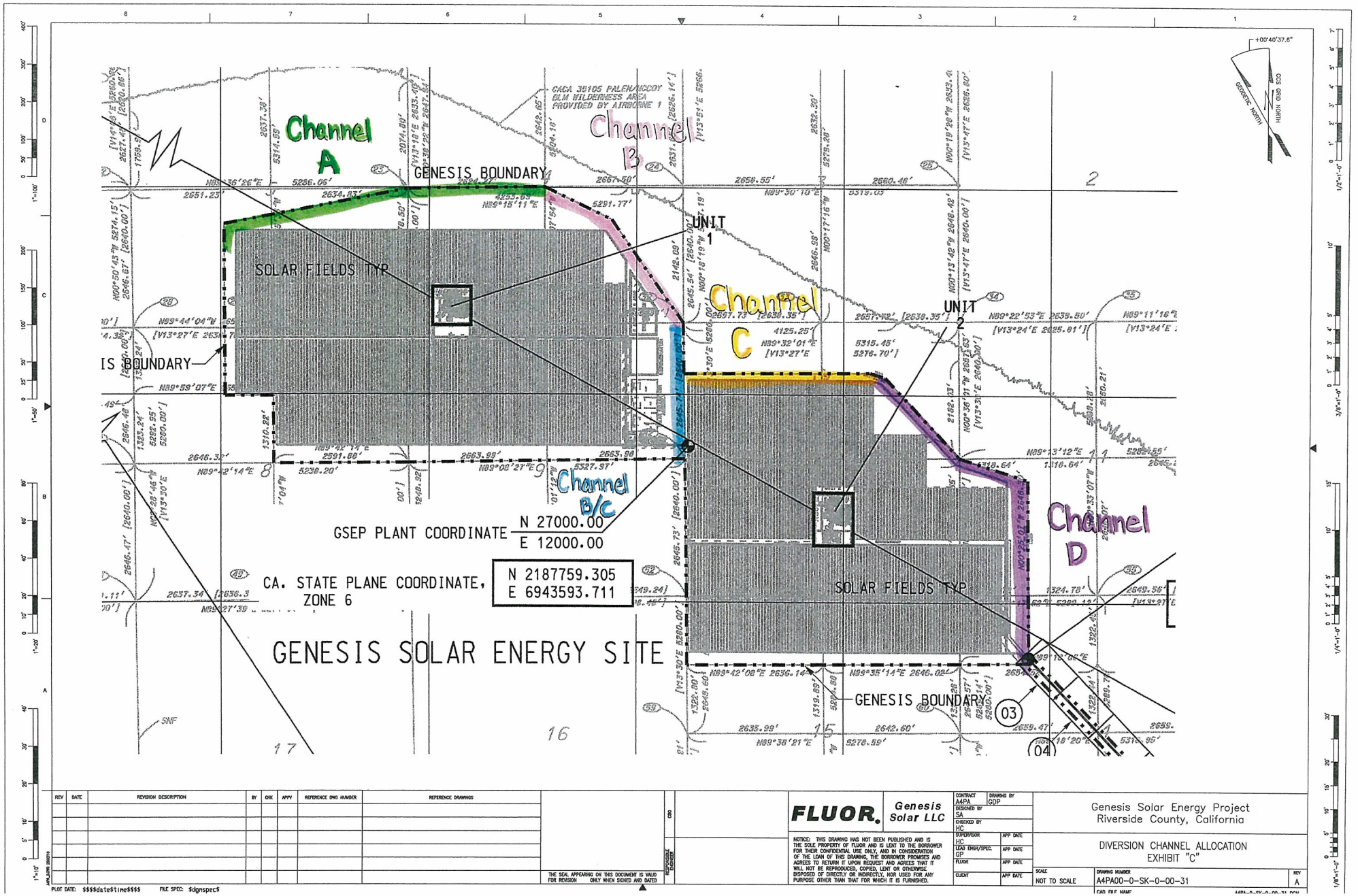

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RESPONSIBLE OWNER

FLUOR. Genesis Solar LLC

CONTRACT A4PA	DRAWING BY GDP		
DESIGNED BY SA			
CHECKED BY HC			
SUPERVISOR HC	APP DATE		
LEAD ENGR/SPEC. GP	APP DATE		
FLUOR	APP DATE		
CLIENT	APP DATE		

Genesis Solar Energy Project
Riverside County, California

DIVERSION CHANNEL ALLOCATION
EXHIBIT "C"

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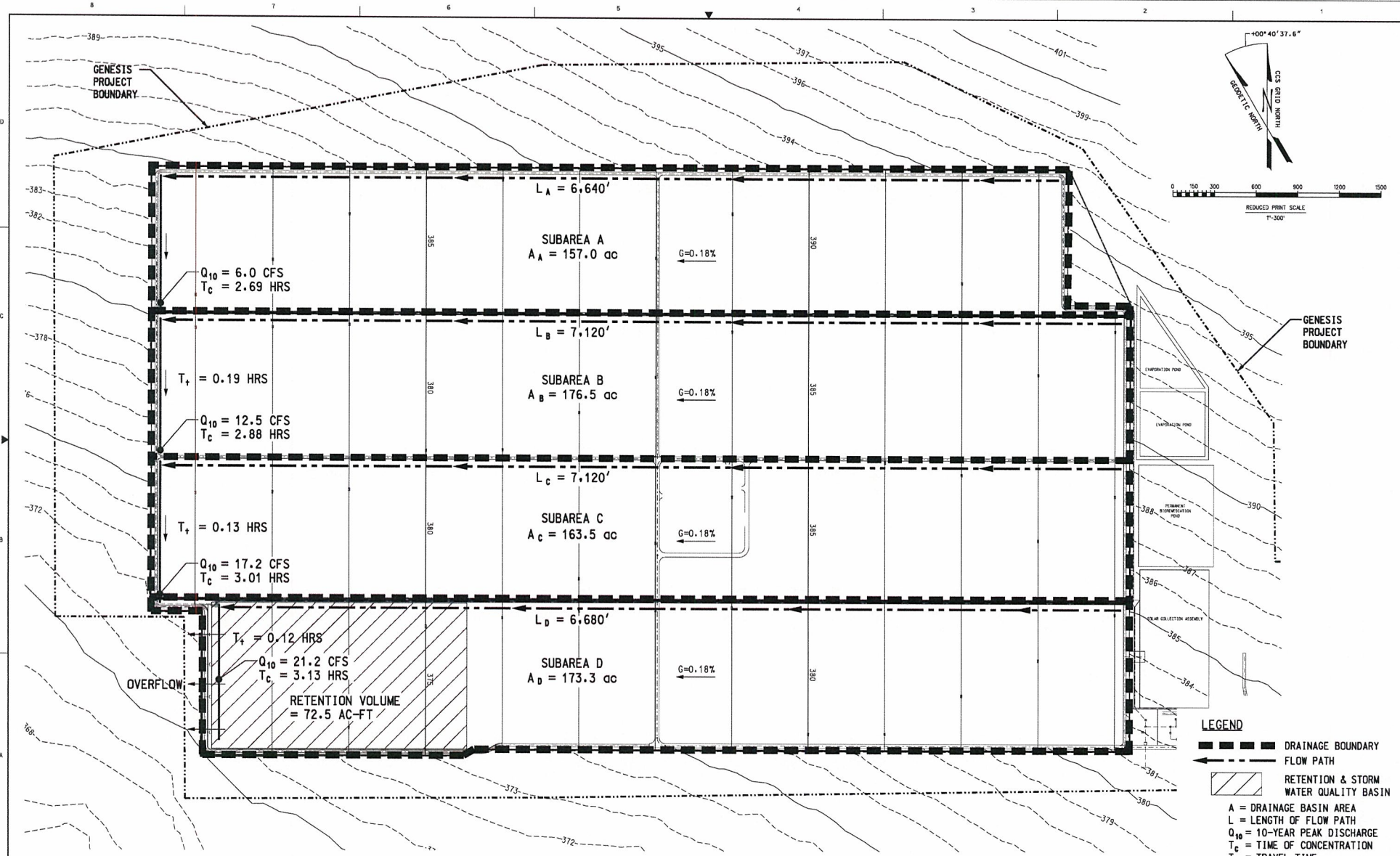

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CONSULTING ENGINEER

CBD

FLUOR. **Genesis Solar LLC**

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LEAD ENGR/SPEC.		APP DATE
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Genesis Solar Energy Project
Riverside County, California

ONSITE HYDROLOGY MAP - UNIT 1
EXHIBIT "D"

SCALE	DRAWING NUMBER	REV
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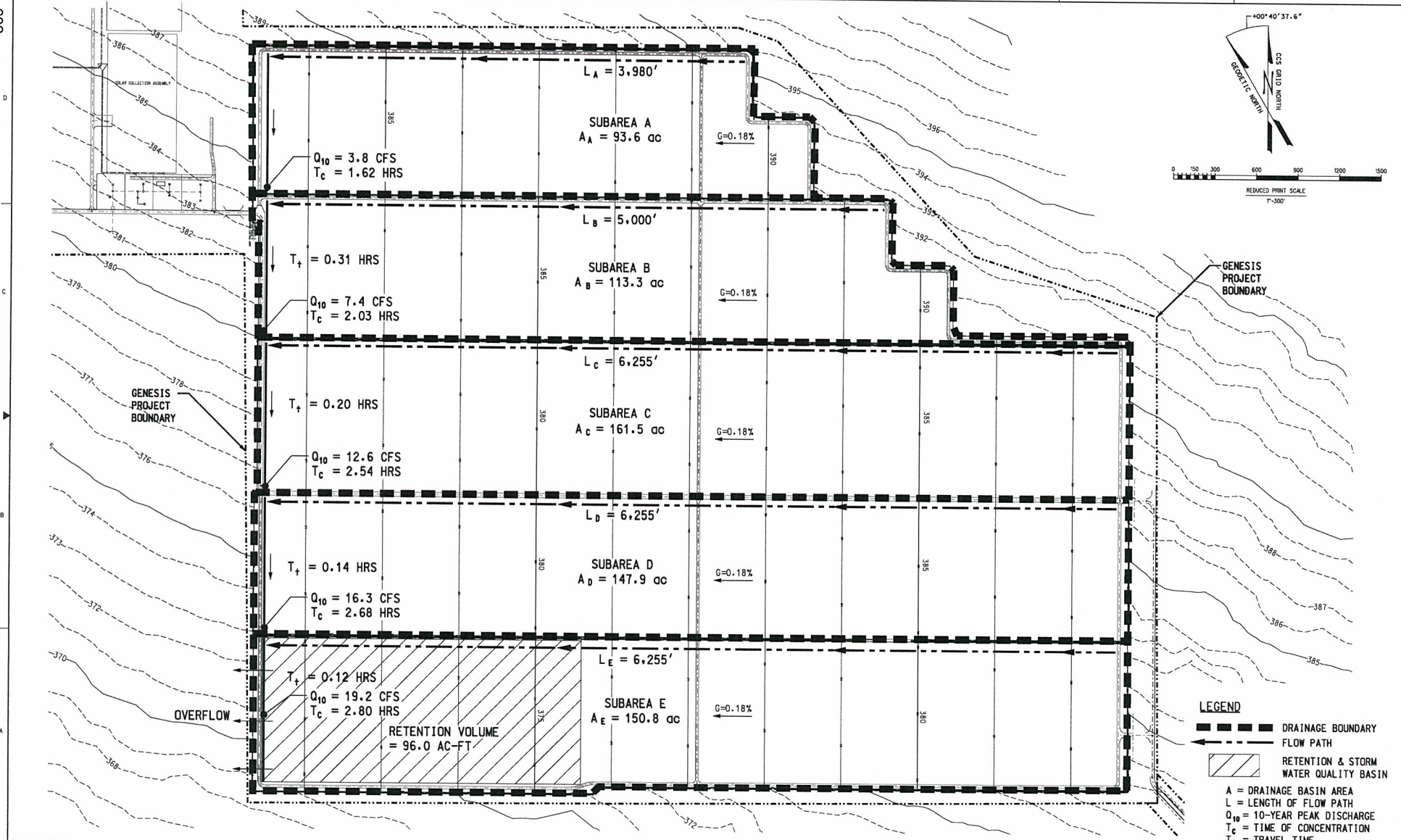

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CDD

REFERENCE DRAWINGS

FLUOR. Genesis Solar LLC

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CHECKED BY	HC	
SUPERVISOR	GP	APP DATE
LEAD ENGR/SPEC.		APP DATE
FLUOR		APP DATE
CLIENT		APP DATE

Genesis Solar Energy Project
Riverside County, California

ONSITE HYDROLOGY MAP - UNIT 2
EXHIBIT "E"

SCALE	DRAWING NUMBER	REV
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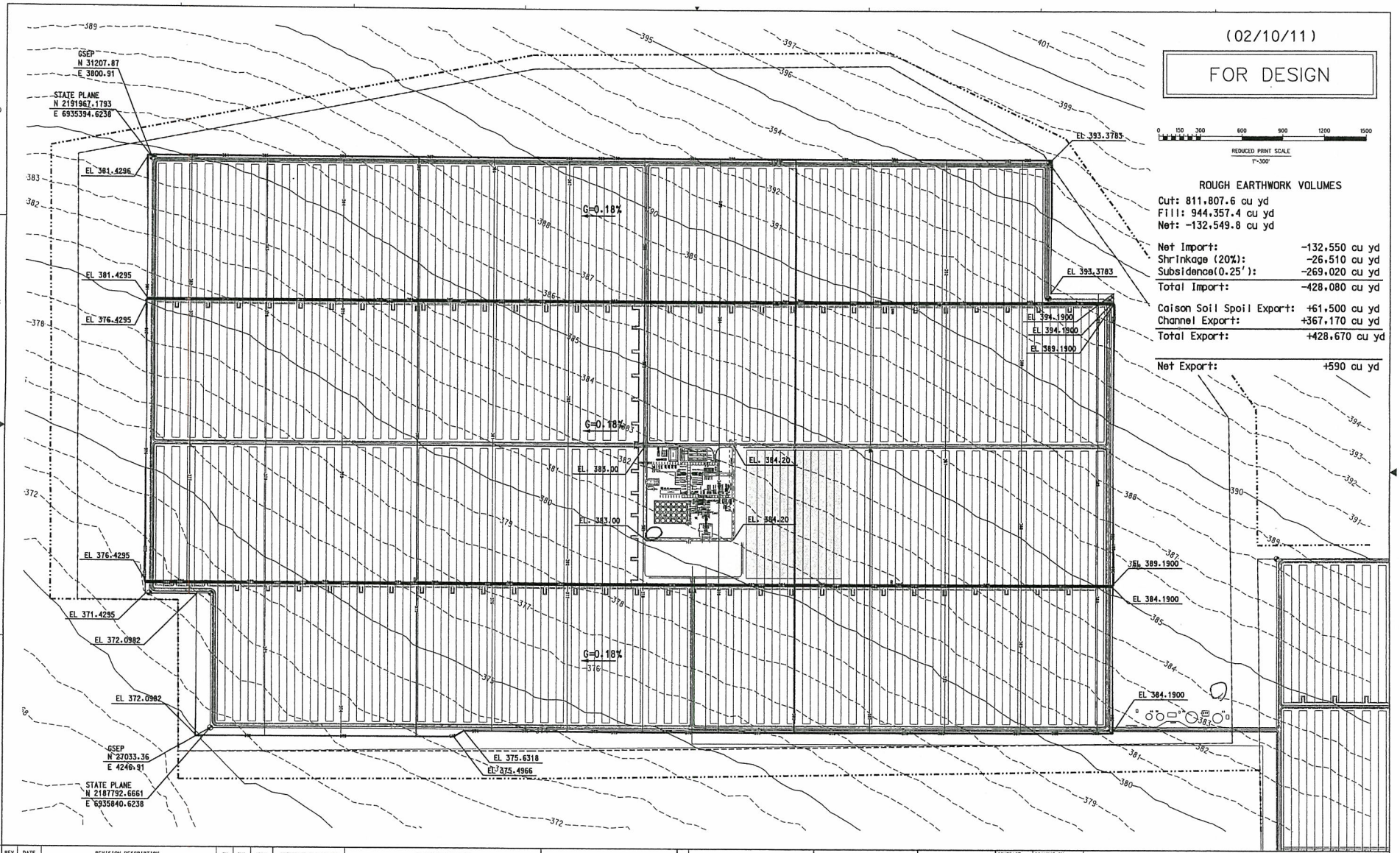

(02/10/11)

FOR DESIGN

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REDUCED PRINT SCALE
1"=300'

ROUGH EARTHWORK VOLUMES

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Fill: 944,357.4 cu yd
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Subsidence(0.25'):	-269,020 cu yd
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Caison Soil Spoil Export:	+61,500 cu yd
Channel Export:	+367,170 cu yd
Total Export:	+428,670 cu yd
Net Export:	+590 cu yd

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REGISTERED ENGINEER

FLUOR. Genesis Solar LLC

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Genesis Solar Energy Project
Riverside County, California

GRADING CONCEPT BASIS
UNIT 1

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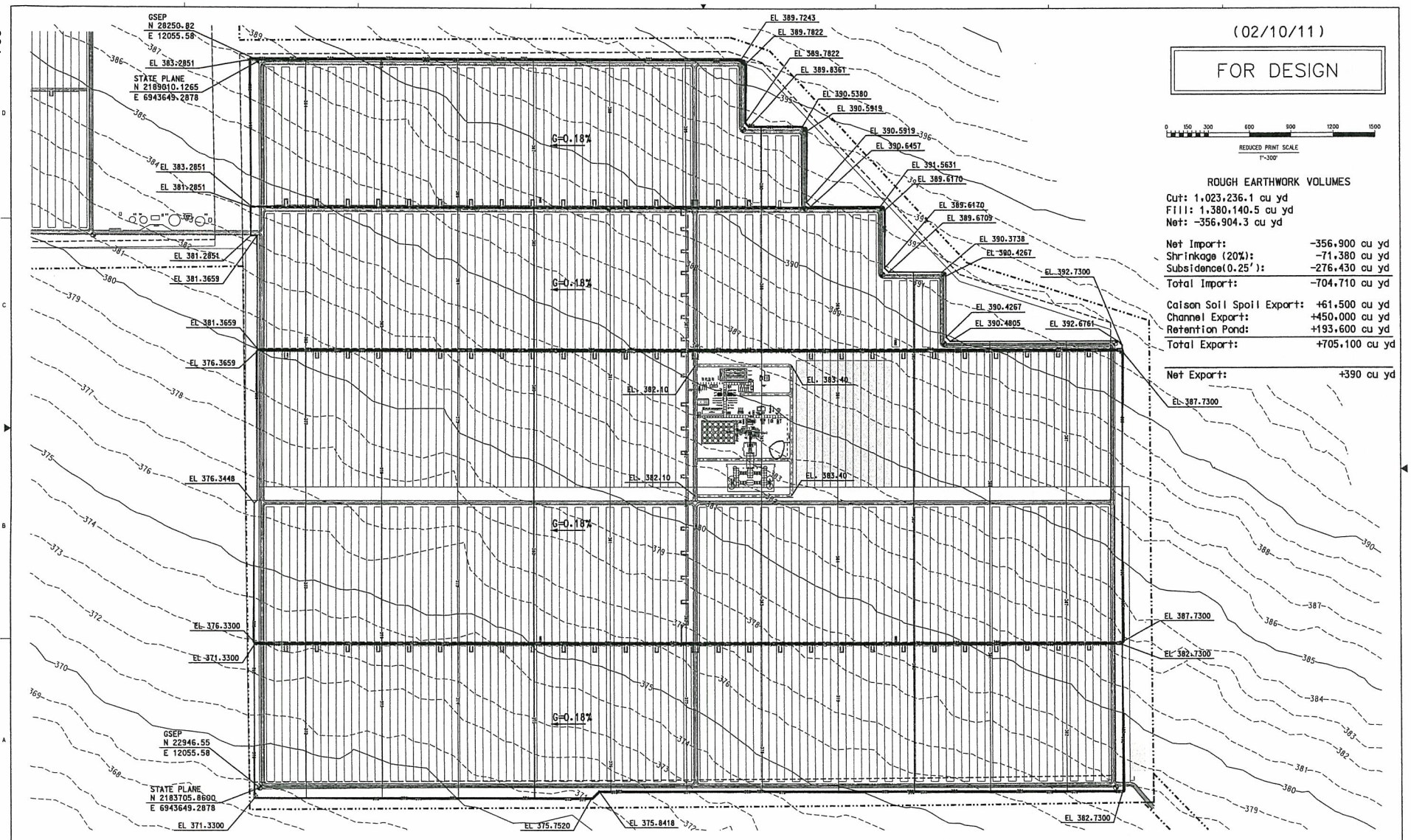

(02/10/11)

FOR DESIGN

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REDUCED PRINT SCALE
1"-300'

ROUGH EARTHWORK VOLUMES

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Net: -356,904.3 cu yd

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Subsidence(0.25'):	-276,430 cu yd
Total Import:	-704,710 cu yd
Caison Soil Spoil Export:	+61,500 cu yd
Channel Export:	+450,000 cu yd
Retention Pond:	+193,600 cu yd
Total Export:	+705,100 cu yd
Net Export:	+390 cu yd

REV	DATE	REVISION DESCRIPTION	BY	CHK	APPV	REFERENCE DWG NUMBER	REFERENCE DRAWINGS

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RESPONSIBLE ENGINEER

CBD

FLUOR. Genesis Solar LLC

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CHECKED BY	HC	
SUPERVISOR	HC	APP DATE
LEAD ENGR/SPEC.	GP	APP DATE
FLUOR		APP DATE
CLIENT		APP DATE

Genesis Solar Energy Project
Riverside County, California

GRADING CONCEPT BASIS
UNIT 2

SCALE	DRAWING NUMBER	REV
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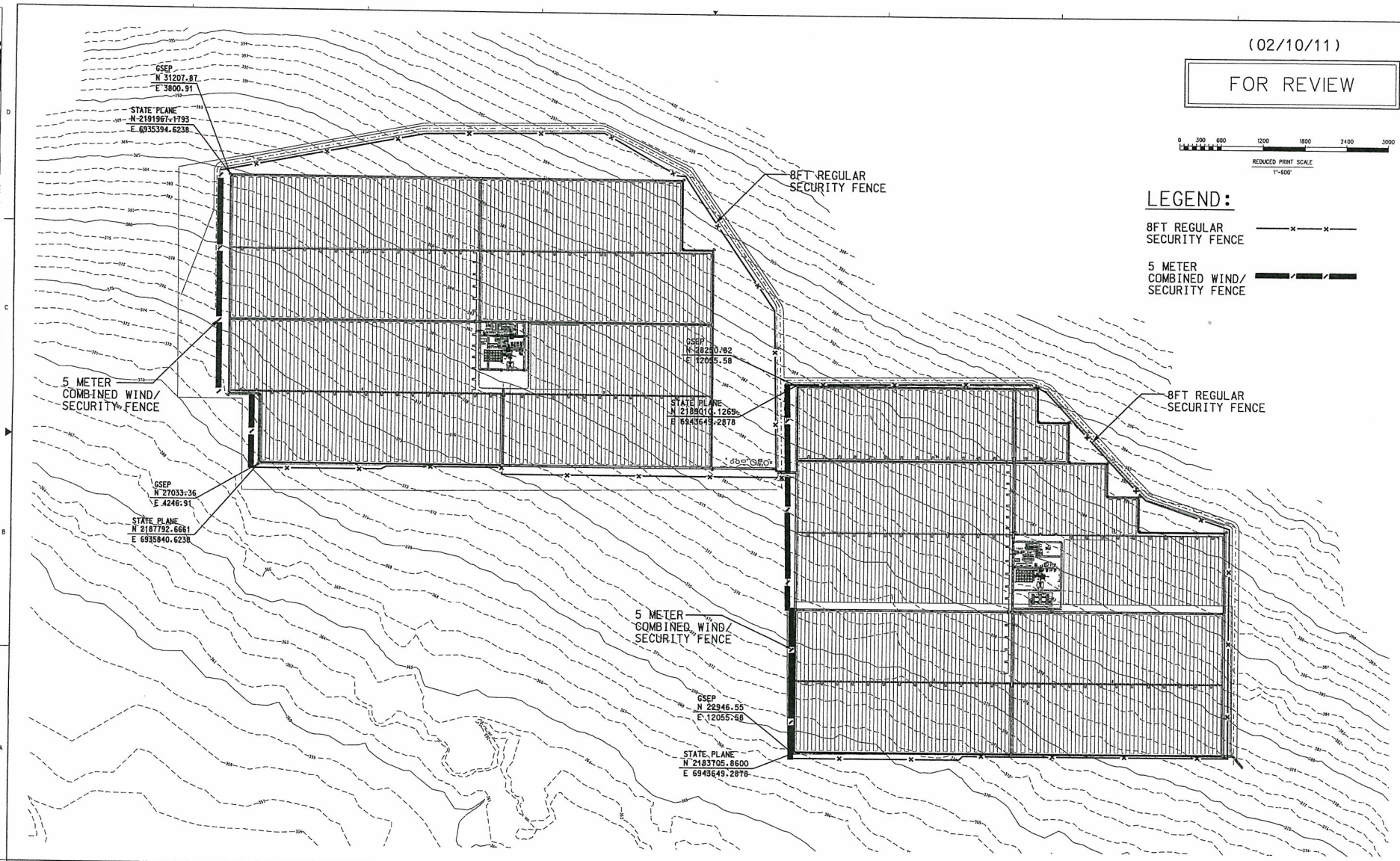

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RESPONSIBLE ENGINEER

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FLUOR Genesis Solar LLC

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Genesis Solar Energy Project
Riverside County, California

PRELIMINARY SITE FENCING LAYOUT
UNIT 1 & 2

SCALE	DRAWING NUMBER	REV
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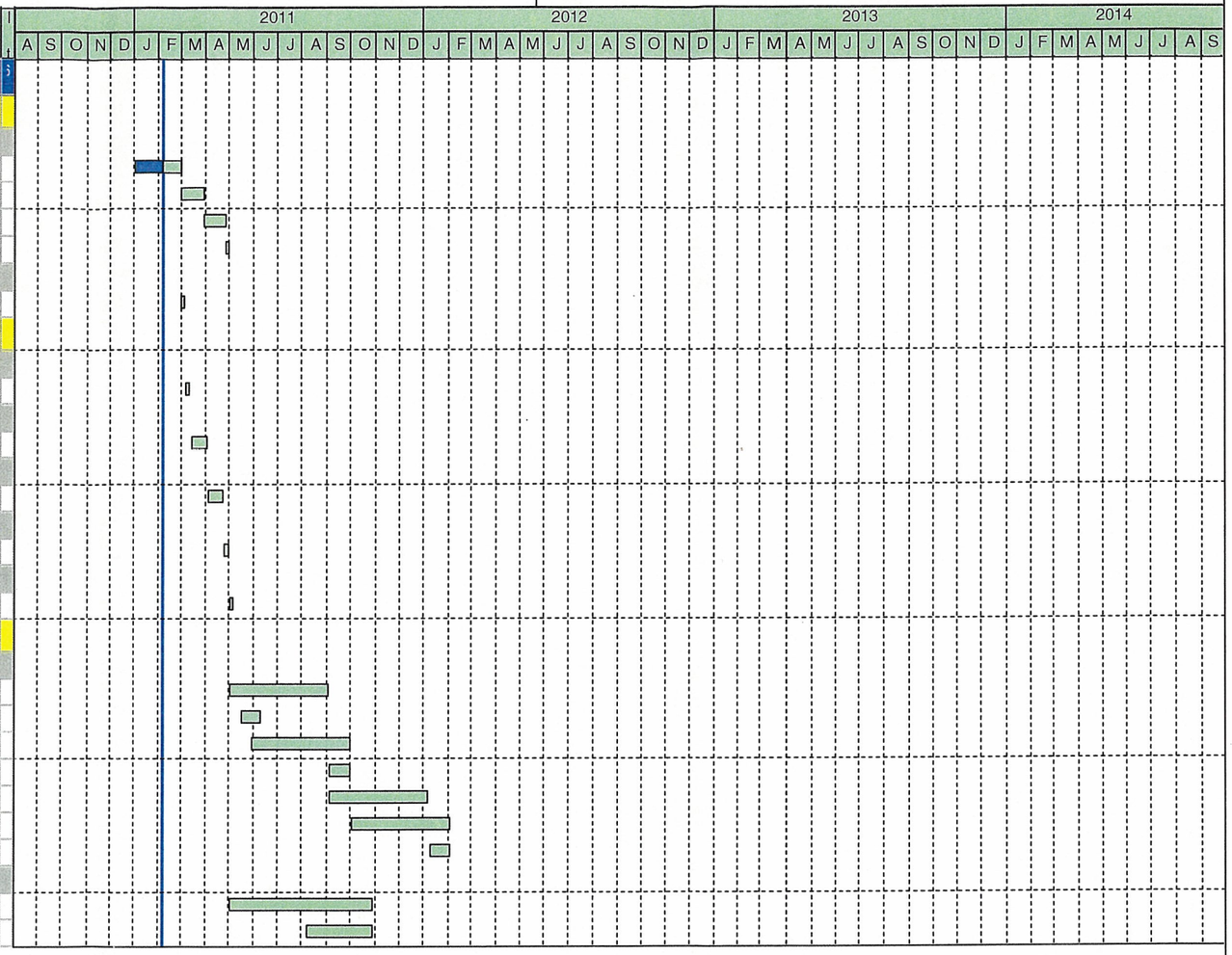
CAD FILE NAME A4PA-0-SK-0-00-29.DGN

Layout: A4PA-KBW by Specific

07-Feb-11 16:23

Activity ID	Activity Name	Dur	Start	Finish
0-6 Site Prep		275	03-Jan-11 A	03-Feb-12
Engineering		75	03-Jan-11 A	29-Apr-11
Civil General		75	03-Jan-11 A	29-Apr-11
E1000210	GENL: Engineer & Develop Prelim Clearing & Grading Drawings / Specs	30	03-Jan-11 A	01-Mar-11
E1000230	GENL: Engineer & Develop Final Clearing & Grading Drawings / Specs	20	02-Mar-11	29-Mar-11
E1000150	GENL: CBO Review Solar Field Clearing & Grading Drawings / Specs / Bid ...	20	30-Mar-11	26-Apr-11
E1000160	GENL: Issue Solar Field Clearing & Graiding Drawings / Specs IFC	3	27-Apr-11	29-Apr-11
C\S\A Procurement Packages		3	02-Mar-11	04-Mar-11
E1000220	GENL: Prepare Engr Package for Clearing & Grading Subcontract	3	02-Mar-11	04-Mar-11
Procurement		45	07-Mar-11	06-May-11
Prep & Issue MR		5	07-Mar-11	11-Mar-11
PC000470	GENL: Prcmt Prep & Issue RFP to Subcontractor for Site Prep	5	07-Mar-11	11-Mar-11
Receive Bids		15	14-Mar-11	01-Apr-11
PC000320	GENL: Subcontractor Bidding Period for Site Prep	15	14-Mar-11	01-Apr-11
Company Approval		15	04-Apr-11	22-Apr-11
PC000480	GENL: Subcontracts Evaluate/Recommend Stie Prep Subcontractor	15	04-Apr-11	22-Apr-11
Award		5	25-Apr-11	29-Apr-11
PC000490	GENL: NextErea Award Site Prep Subcontract	5	25-Apr-11	29-Apr-11
Vendor Drawings		5	02-May-11	06-May-11
PC000220	GENL: Mobilize Site Prep Subcontractor	5	02-May-11	06-May-11
Construction		200	02-May-11	03-Feb-12
Site Prep / Earthwork		200	02-May-11	03-Feb-12
C1020040	GENL: Clear & Grub (Unit 1)	90	02-May-11	02-Sep-11
CC000100	GENL: Rouch Grade Common Area	20	16-May-11	10-Jun-11
C1020010	GENL: Rough Grade Solar Field (Unit 1)	90	30-May-11	30-Sep-11
C1000010	GENL: Rough Grade Power Block (Unit 1)	20	05-Sep-11	30-Sep-11
C2020050	GENL: Rough Clear & Grub (Unit 2)	90	05-Sep-11	06-Jan-12
C2020020	GENL: Rough Grade Solar Field (Unit 2)	90	03-Oct-11	03-Feb-12
C1000030	GENL: Rough Grade Power Block (Unit 2)	20	09-Jan-12	03-Feb-12
Civil		130	02-May-11	28-Oct-11
CC000110	GENL: Install Diversion Channels (Units 1/2)	130	02-May-11	28-Oct-11
CC000120	GENL: Install Main Road (Units 1/2)	60	08-Aug-11	28-Oct-11



DFT
Clear & Compact

Actual Work
Remaining Work
Critical Remaining Work
Milestone

606

Genesis Solar Energy Project 2X125MW

EPCC Schedule

Date	Revision	Checked	Approved
30-Aug-10	Rev. 0	EDGE	CJ

SOIL and WATER 2 - GROUNDWATER LEVEL MONITORING, MITIGATION, AND REPORTING PLAN

Verification: The Project owner shall do all of the following:
a. At least thirty (30) days prior to Project construction, the Project owner shall submit to the CPM, a comprehensive report presenting all the data and information required in item a above.
b. The Project owner shall submit to the CPM all calculations and assumptions made in development of the report data and interpretations.
c. During Project construction, the Project owner shall submit to the CPM quarterly reports presenting all the data and information required in item B above.
d. The Project owner shall submit to the CPM all calculations and assumptions made in development of the report data and interpretations.
e. No later than sixty (60) days after commencing Project operation, the Project owner shall provide to the CPM for review and approval, documentation showing that any mitigation to private well owners during Project construction was satisfied, based on the requirements of the property owner as determined by the CPM.
f. During Project operation, the Project owner shall submit to the CPM, applicable quarterly, semi-annual and annual reports presenting all the data and information required in item C above. Quarterly reports shall be submitted to the CPM thirty (30) days following the end of the quarter. The 4th quarter report shall serve as the annual report, and will be provided on January 31 in the following year.
g. The Project owner shall submit to the both the CPM all calculations and assumptions made in development of report data and interpretations, calculations, and assumptions used in development of any reports.
h. The Project owner shall provide mitigation as described in item 3.c above, if the CPM's inspection of the monitoring information confirms Project-induced changes to water levels and water level trends relative to measured preproject water levels, and well yield has been lowered by Project pumping. The type and extent of mitigation shall be determined by the amount of water level decline and site specific well construction and water use characteristics. The mitigation of impacts will be determined as set forth in item 3.c above.
i. If mitigation includes monetary compensation, the Project owner shall provide documentation to the CPM that compensation payments have been made by March 31 of each year of Project operation or, if lump-sum payment are made, payment is made by March 31 following the first year of operation only.
Within thirty (30) days after compensation is paid, the Project owner shall submit to the CPM a compliance report describing compensation for increased energy costs necessary to comply with the provisions of this condition.
j. After the first five year operational and monitoring period, the Project owner shall submit a 5-year monitoring report to the CPM that submits all monitoring data collected and provides a summary of the findings. The CPM will determine if the water level measurement frequencies should be revised or eliminated.

FOURTH QUARTER 2014
and
2014 ANNUAL
GROUNDWATER LEVEL MONITORING
REPORT
Genesis Solar Energy Project

Riverside County, California

COC S&W-2

December 19, 2014

Prepared By:

Northstar Environmental Remediation

26225 Enterprise Court

Lake Forest, California 92630

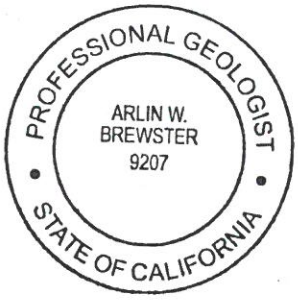
SIGNATURE PAGE

FOURTH QUARTER 2014 AND 2014 ANNUAL GROUNDWATER LEVEL MONITORING REPORT

RIVERSIDE COUNTY, CALIFORNIA

PROFESSIONAL STATEMENT

I, Arlin W. Brewster, A Professional Geologist with the State of California, have reviewed this report, '***Fourth Quarter 2014 and 2014 Annual Groundwater Level Monitoring Report, Genesis Solar Energy Project, Riverside County California***'.



Arlin W. Brewster

Professional Geologist 9207

December 19, 2014

Table of Contents

List of Tables

List of Figures

List of Appendices

LIST OF ACRONYMS AND ABBREVIATIONS

afy	acre-feet per year
amsl	above mean sea level
AFC	Application for Certificate
ASTM	American Society of Testing Materials
bgs	below ground surface
BLM	Bureau of Land Management
C	Celsius/Centigrade
CEC	California Energy Commission
COC S&W-2	Condition of Certification Soil & Water 2
CVGB	Chuckwalla Valley Groundwater Basin
°	Degrees
F	Fahrenheit
FEIS	Final Environmental Impact Statement
GSEP	Genesis Solar Energy Project
GLMP	Groundwater Level Monitoring Program
MW	Megawatt
mm	Millimeters
NWIS	National Water Information System
NCDC	National Climate Data Center
POD	Plan of Development
PVMGB	Palo Verde Mesa Groundwater Basin
toc	top of casing

1.0 INTRODUCTION

This Fourth Quarter 2014 and 2014 Annual Groundwater Level Monitoring Report has been prepared by Northstar Environmental Remediation (Northstar) to provide information collected during the Groundwater Level Monitoring Event performed in December 2014 at the Genesis Solar Energy Project (GSEP) and to provide a summary of groundwater level monitoring events over the 2014 calendar year. The work was performed during normal facility operation (post-construction) in accordance with Condition of Certification Soil & Water 2 (COC S&W-2) as presented in the California Energy Commission (CEC) Final Decision document dated October 12, 2010 (CEC, 2010). As shown in **Figure 1**, the GSEP is located approximately 25 miles west of the city of Blythe, California in eastern Riverside County on lands managed by the Bureau of Land Management (BLM).

1.1 Background

An updated Plan of Development (POD) for the GSEP was submitted to the BLM by Genesis Solar LLC (Genesis) in September 2010 (Genesis Solar, LLC 2010). In addition, Genesis submitted an Application for Certification (AFC) for the GSEP to the CEC in August 2009 (Genesis Solar, LLC 2009). The CEC issued its Final Decision on the GSEP on October 12, 2010 (CEC, 2010). The BLM issued the Final Environmental Impact Statement (FEIS) for the GSEP for public comment on August 27, 2010.

As described in the CEC's Final Decision, the GSEP consists of two independent concentrated solar electric generating facilities with a nominal net electrical output of 125 megawatts (MW) each, for a total net electrical output of 250 MW. The GSEP utilizes dry cooling technology and relies on groundwater as a water source during the current operation of the facility. Three groundwater production wells were installed on the GSEP between July and October 2011. These are permitted to pump groundwater at up to 1,348 acre-feet per year (afy) during construction and an average rate of 202 afy during operation. The potential impacts associated with the proposed groundwater use by the GSEP are discussed in the Final Decision and FEIS. Groundwater drawdown impacts are anticipated to be less than significant, but because the prediction of groundwater level effects by computer modeling entails inherent uncertainty, both the Final Decision and the FEIS adopted COC S&W-2 for the GSEP to monitor groundwater level at the vicinity of the GSEP.

1.2 Geographic Setting

The GSEP is located between the communities of Blythe, California (approximately 25 miles east) and Desert Center, California (approximately 27 miles west). Land use is characterized predominantly by open space and conservation and wilderness areas. Chuckwalla and Ironwood State Prisons are located approximately 6 miles to the southeast of the GSEP.

The GSEP lies on a broad, relatively flat, sloping surface underlain by alluvial deposits derived from the Palen Mountains to the north-northwest, and the McCoy Mountains to the northeast **(Figure 2)**.

The deposits immediately adjacent to the mountains have formed alluvial fans from multiple identifiable sources, and multiple fan surfaces have coalesced into a single bajada surface that wraps around each of these mountain fronts. Between the bajada surfaces from each mountain chain lies a broad valley-axial drainage that extends southward between the mountains and drains to the Ford Dry Lake playa, located about 1 mile south of the GSEP facility. The GSEP is on relatively flat topography and generally slopes from north to south, with elevations of approximately 400 to 370 feet above mean sea level (amsl). It is occupied by a community of low creosote and bursage scrub vegetation.

Climatic data collected from Weather Station Blythe Riverside Airport (33.61°N, -114.71°W, at an elevation of about 387 feet amsl) indicate that the average maximum temperature in the airport vicinity is approximately 87.6°F (30.9°C). Average rainfall is reported to be approximately 3.6 inches (91.4 mm). These data were received from National Climate Data Center TD 9641 Clim 81 1961-1990 Normals for a 30-year period (between 1961 and 1990).

1.3 Hydrogeologic Setting

The GSEP is located within the Chuckwalla Valley Groundwater Basin (CVGB) which has a surface area of 940 mi^2 (2,435 km^2) underlying Chuckwalla Valley. The CVGB is bounded upgradient by three other groundwater basins that include the eastern part of the Orocopia Valley and Pinto Valley Groundwater Basins and the southern part of the Cadiz Valley Groundwater Basin, and downgradient by the Palo Verde Mesa Groundwater Basin (PVMGB) **(Figure 2)**. Groundwater occurs at depths of about 80 to 140 feet below ground surface (bgs) and groundwater flow is generally southeast to eastward, from the CVGB into the PVMGB **(Figure 2)**.

Recharge to the CVGB is from sources including precipitation, inflow from the Orocopia Valley and Pinto Valley Groundwater Basins, and return flows from agricultural sources and treated wastewater effluent. Groundwater provides the only available water resource in Chuckwalla Valley, with extraction to meet local demand representing the primary source of groundwater outflow. Other minor sources of outflow include underflow to the PVMGB and evapotranspiration in portions of Palen Dry Lake (where shallow groundwater is present). Calculations of the CVGB groundwater budget prior to GSEP operations indicate a stable surplus of 2,600 afy (CEC, 2010). Current operational demands are estimated to not exceed 202 afy which will not exceed the annual CVGB surplus (CEC, 2010).

Based on recent monitoring data, the depth to groundwater in the Bouse Formation ranges from approximately 86.50 feet bgs (300.90 feet amsl) in TW-1, located upgradient of the site, to 137.18 feet bgs (254.92 feet amsl) in Well 23a, located downgradient of the site. Perched water exists at the Chuckwalla State Prison but is unlikely to occur within the GSEP boundaries as there is no irrigation.

1.4 Monitoring Program Objectives

Groundwater level monitoring is performed at the GSEP in accordance with COC S&W-2 as described in the CEC's Final Decision. Groundwater level monitoring will be performed on a quarterly basis during the lifetime of the GSEP. The primary objective for the monitoring was to establish pre-construction groundwater elevation trends and to monitor groundwater elevations during construction and operation of the GSEP to identify any potential impacts within a 10-mile radius. The currently established action level for groundwater elevation impacts is a documented decline of 5 feet or more below established background groundwater elevation trends (COC S&W-2 Item C2) (CEC 2010).

2.0 GROUNDWATER LEVEL MONITORING PROGRAM

This section provides an overview of the Groundwater Level Monitoring Program (GLMP) for the GSEP following construction and during the first five years of facility operation.

2.1 Monitoring Well Network

A brief summary of the monitoring well network for the GSEP required under COC S&W-2 is provided below. Well locations are illustrated in **Figure 3** and are summarized in **Table 1**.

- The onsite wells installed by WorleyParsons for the GSEP include the deep test wells TW-1 and TW-2 and shallow observation well OBS-1.
- Observation well OBS-2 which was installed by WorleyParsons for the GSEP and is monitored through four buried multi-level pressure transducers.
- Existing and functional offsite wells located within two (2) miles of the GSEP and offsite linears, including water supply well 23a (located at CalTrans rest stop at Wiley's Well Exit and Interstate 10) and wells 24-1, 24-2, and 24-3 (anode protection wells owned by the Southern California Gas Company (SoCal Gas) located north of Interstate 10 and west of the CalTrans rest stop).
- Well 14, a water supply well located along Chuckwalla Valley Road south of I-10, which was added to the program at the request of CEC staff.
- Three production wells (Production Well 0, Production Well 1, and Production Well 2, referenced as PW-0, PW-1, and PW-2, respectively) were installed at the GSEP between June and October 2011. Currently, PW-1 is sealed with a metal plate and PW-0 and PW-2 have ports installed to manually gauge water levels.
- Three groundwater monitoring wells (Detection Monitoring Well 1, Detection Monitoring Well 2, and Detection Monitoring Well 3, referenced as DM-1, DM-2, and DM-3, respectively) were installed for the GSEP evaporation ponds in February 2012.
- Other water wells within 10 miles of GSEP for which water level data are available from the National Water Information System (NWIS) database maintained by the U.S. Geological Survey (USGS). Data reported for these wells has been inconsistent but is used for general groundwater contouring if data exists within the most recent year.

2.2 Groundwater Level Monitoring Activities

The Quarterly GLMP at the GSEP includes the following scope of work:

- Groundwater level measurement are taken in wells included in the GLMP;

- Compilation of groundwater level data for wells located in the CVGB within 10 miles of GSEP for which data is available from public sources;
- Evaluation of groundwater level data, including appropriate statistical and graphical methods; and,
- Preparation of a potentiometric surface map.

3.0 FIELD METHODS

Fourth Quarter 2014 groundwater level monitoring was performed at the GSEP on December 4 and 5, 2014 in conjunction with groundwater quality monitoring.

3.1 Water Level Measurements

The depth to groundwater in each well was measured using an electric well sounder in general accordance with the American Society for Testing and Materials (ASTM) Test Method for Determining Subsurface Liquid Levels in a Borehole or Monitoring Well (Observation Well) (ASTM, 1993a). Water level measurements were taken at each well as quickly as practical to best represent the potentiometric surface across the GSEP at a single time. Water level measurements were recorded to the nearest hundredth (0.01) foot.

Water levels were recorded on a water level monitoring field form. A copy of the groundwater level monitoring field form is included in **Appendix A**. The depth to water measurements recorded for wells included in the monitoring program during this event are presented in **Table 2**. A summary of current and historical water level measurements and calculated groundwater elevations for wells included in the GLMP, and additional wells in the CVGB that are located within 10 miles of GSEP, are also presented in **Table 2**.

Water levels were also measured using the buried multi-level pressure transducers at OBS-2. OBS-2 consists of an array of four buried Geokon Model 4500S vibrating wire pressure transducers placed at depths of approximately 270, 315, 370, and 400 feet below ground surface. Instantaneous measurements were taken from the transducers in OBS-2 using a Geokon Model 800 data logger for the transducers following the manufacturer's instructions. The measurements obtained and water level calculations are included in **Appendix A** and the results are summarized in **Table 2**.

Continuous water level measurements were obtained from well TW-2 from January to February 2011, in well OBS-1 from November 2010 to present, and in well TW-1 from November 2010 to present through self-contained, continuous recording Solinst Levelogger pressure transducers. Continuous water level measurements at TW-2 ended on February 8, 2011. The pressure transducers were programmed and installed in accordance with the manufacturer's instructions. These pressure transducers were lowered into the wells to depths of approximately 10 feet below the water table on braided nylon string secured to the wellhead. They were programmed to record the water pressure values in feet of water above the transducer at 6-hour intervals. In addition, a Solinst Barologger transducer capable of recording changes in barometric pressure was hung in the casing of Well OBS-1 above the water table to assess changes in water level that are due to barometric pressure changes. During each monitoring event, the data is downloaded from the Levelogger and Barologger transducers and manual depth to water measurements are obtained. Using Solinst software, the Levelogger data is calibrated to the manual groundwater elevation measurements and adjusted for changes in barometric pressure using the Barologger data. This data set is then analyzed for seasonal and diurnal trends in the shallower Alluvium

aquifer (OBS-1) and the deeper Bouse Formation aquifer (TW-1). Transducer data from OBS-1 and TW-1 is included in **Appendix B**.

3.2 Equipment Decontamination

Equipment used for groundwater monitoring was decontaminated before and prior to re-use to minimize the potential for affecting the quality of water in all GLMP wells. The segment of cable from the sounder assembly that entered the water, the water sensor probe, and the transducers were decontaminated in a solution of laboratory-grade non-phosphate detergent and potable water, followed by rinsing with distilled water prior to insertion in the wells.

4.0 RESULTS OF FOURTH QUARTER 2014 GROUNDWATER LEVEL MONITORING

Fourth Quarter 2014 groundwater elevation data for all wells in the GLMP are presented in **Table 2**. This table also includes historical groundwater level data for the wells included in the GLMP and wells located within 10 miles of the GSEP for which water level data are publicly available (e.g., from the NWIS, the California Department of Water Resources, or from the California Department of Corrections). A groundwater elevation contour map was prepared for the area within 10 miles of the GSEP using groundwater elevation data collected in the Fourth Quarter of 2014 for the wells completed in the pumped aquifer within the Bouse Formation and Fanglomerate that are included in the groundwater level monitoring program (**Figure 4**). The contour map shows that groundwater in the Bouse Formation generally moves in an east to southeast direction. As shown on **Figure 4**, the general groundwater flow direction near GSEP during the Fourth Quarter 2014 event is to the east-southeast with a lateral hydraulic gradient of approximately 0.0009 feet/foot.

Wells OBS-1, OBS-2 and TW-1 are located in close proximity to each other and are completed at multiple depths, allowing assessment of the vertical hydraulic gradient across the lower alluvial aquifer and aquitard materials in the upper portion of the Bouse Formation. The vertical distance between the mid-points of the screened intervals in wells OBS-1 and TW-1 is 325 feet. The groundwater level in OBS-1 was measured to be 310.20 feet amsl (on December 4, 2014), which is more than 9 feet higher than the groundwater level recorded on the same day for TW-1 (300.90 feet amsl). The vertical gradient between these wells is therefore calculated to be approximately 0.03 feet/foot downwards.

As shown on **Table 2**, groundwater levels in the wells included in the monitoring program have remained relatively stable since the inception of the monitoring program in the Fall of 2010.

- The hydrograph for TW-1 indicates that groundwater elevation increased approximately 3 feet from May 2009 to November 2010, and has remained relatively constant near 301 feet amsl through December 2014. Based on data collected, groundwater levels in this well appear unaffected by seasonal trends or pumping activities at the GSEP.

- The hydrograph for TW-2 indicates that the groundwater elevation increased approximately 7 feet between January 2010 and January 2011, decreased approximately 2 feet between January and September 2011, and has remained relatively stable at approximately 266 feet amsl through December 2014. The initial portion of this water level decline between January and June 2011 may be attributed to residual drawdown related to temporary construction pumping from this well. The groundwater elevation decreased by approximately 1.5 feet between June 9 and September 26, 2011, but is currently not attributed to pumping activity. PW-0 began pumping on September 24, 2011 but is located 6 miles from well TW-2, so is not a likely candidate for this elevation drop. The decrease in water level during this timeframe is also apparent in well 24-1, which is located within 0.5 miles of TW-2. Based on this information, groundwater levels in TW-2 measured to-date appear unaffected by seasonal trends or pumping at the GSEP.

- The hydrograph for OBS-1 indicates that the groundwater elevation increased approximately 1.5 feet from May 2009 to November 2010, and has remained relatively stable at approximately 310 feet amsl through December 2014. This well is screened from approximately 100 to 150 feet bgs in the shallow Alluvium aquifer and, as such, is not used for groundwater elevation contouring. Groundwater levels in this well appear unaffected by pumping at the GSEP and do not display a seasonal correlation.

- Historically, the hydrographs for the buried transducers OBS-2-270, OBS-2-315, OBS-2-370, and OBS-2-400 displayed similar decreasing trends from July 2009 through February 2014. All of the groundwater elevations decreased by approximately 1.47 to 2.78 feet from their first data points in July 2009 to September 2011, then increased by approximately 0.19 to 0.30 feet from September 2011 to February 2012, then decreased by approximately 0.84 to 1.22 feet from February 2012 to February 2014. The majority of the recorded groundwater level decline in this transducer cluster occurred prior to November 2010, before the initiation of pumping for the GSEP. Based on the data collected, the groundwater level trends in this well cluster did not appear to coincide with pumping at the GSEP, and the groundwater levels did not display a seasonal correlation. Due to the loss of the original transducer configuration file and calibration data, the data in the buried transducers can no longer be accessed.

- The hydrograph for Well 23a indicates a highly variable groundwater elevation that generally does not appear to coincide with pumping at the GSEP. Well 23a is located at the CalTrans rest stop at Wiley's Well Road and fluctuations may be related to unknown activity at this location. Increases in groundwater elevation generally occur in the first quarter of every year. The reason is currently unknown.

- The hydrograph for Well 24-1 indicates that the groundwater elevation decreased approximately 3 feet between February 2011 and June 2011. From June 2011 through October 2012, the groundwater elevation at well 24-1 remained relatively stable at approximately 262 feet amsl. Groundwater elevations fluctuated from October 2012 through February 2014 and have stabilized at approximately 262.50 feet amsl from May through December 2014. Although the initial groundwater level decline recorded in this hydrograph coincides with temporary construction pumping from well TW-2, pumping from this well was limited to January and February 2011. However, groundwater levels in well 24-1 have remained stable over a more extended period. This suggests the groundwater level fluctuations observed in this well are not related to pumping for the GSEP. In addition, the water levels do not appear to be seasonally correlated.

- Groundwater elevation hydrographs for SoCal Gas anode Wells 24-2 and 24-3 currently do not display a trend as there is not yet enough data. Groundwater elevations have not consistently been collected from these locations historically.

- The hydrograph for Well 14 clearly indicates that groundwater elevation fell approximately 23 feet from February 2011 to June 2011. However, no pumping is known to have occurred in the vicinity of this well at that time. Furthermore, the February 2011

reading appears anomalous as indicated in previous reports. From June 2011 through December 2014, the groundwater elevation has remained relatively stable in this well, indicating that water levels are not being influenced by pumping. In addition, the water levels measured in this well do not display a seasonal correlation. Well 14 is screened from 890 to 940 feet bgs and WorleyParsons personnel have indicated that there is a blockage in this well at approximately 450 feet bgs. It is currently unknown if this blockage is affecting the groundwater level measurements from this well.

- Groundwater production well PW-0 did not historically display a groundwater elevation trend due to intermittent pumping activity from this well during the construction phase of the facility. PW-0 has been offline since the completion of construction activities and has displayed a relatively stable groundwater elevation of approximately 285 feet amsl from February through December 2014.

- Groundwater elevation hydrographs for onsite production wells PW-1 and PW-2 currently do not display a trend due to lack of representative data and intermittent historical pumping activity in these wells.

- Groundwater elevation hydrographs for detection monitoring wells DM-1, DM-2, and DM-3 (which are primarily used for detection monitoring of the brine ponds) display very similar trends. All three wells are screened from approximately 100 to 120 feet bgs in the shallow Alluvium aquifer. As such, these wells are not used for groundwater elevation contouring. Groundwater elevations decreased approximately 1.5 feet between February and November 2012, increased approximately 1.0 feet between November 2012 and March 2013, and have been relatively stable from March 2013 through December 2014. The initial groundwater elevation decline may be related to production well pumping.

Several wells within 10 miles of GSEP have groundwater level measurement records spanning several years (**Table 2**). The well with the longest and most continuous water level record is Well 43, which is situated to the south of Well TW-2, at the Department of Corrections Chuckwalla Facility. Groundwater elevation data for this well were obtained from the NWIS system. Data for this well span a period from 1982 through May 2014. A hydrograph for this well is included in **Appendix 2**. The hydrograph shows that groundwater levels in the Bouse Formation/Fanglomerate aquifer are currently stable near this well.

Water level data recorded by the two pressure transducers that were installed in wells TW-1 and OBS-1 since the pre-construction monitoring event (in November 2010) were downloaded during the Fourth Quarter 2014 groundwater level monitoring event. After downloading the data, the transducers were re-deployed in the wells. Groundwater level data obtained from these wells were used to prepare hydrographs to show diurnal and seasonal fluctuations in groundwater levels in the GSEP area. Hydrographs for the most recently collected data set (August 9 through December 4, 2014) are present in **Appendix 2** and show very slight diurnal and longer term fluctuations in groundwater levels of up to a few inches. The hydrograph for well OBS-1 indicates an influx of water on August 8, 2014 between approximately 1:00 am and 7:00 am, on August 21, 2014 between approximately 1:00 pm and 7:00 pm, and on September 9, 2014 between approximately 1:00 pm and 7:00 pm. During these events, groundwater elevations

increased by approximately 0.09, 0.06, and 0.04 inches, respectively, but trended back towards static conditions. These dates are consistent with local thunderstorms: the area received 0.08 inches of precipitation on August 12 and 13, 0.47 inches on August 20 and 21, and 0.04 inches on September 8 and 9, 2014. A failure of the transducer in TW-1 caused the pressure sensor to drift significantly over the reporting period and is currently being evaluated by the manufacturer (Solinst). As such, the hydrograph for this well has not been generated for this quarter. As noted above, the manually collected groundwater level for TW-1 indicates a groundwater elevation consistent with static conditions.

Historically, a pressure transducer was deployed in well TW-2 to record the influence of pumping from this well for the construction of the GSEP main access road. Between the first quarter event in February 2011 and the second quarter event in June 2011, the transducer was lost due to a corroded cable and could not be retrieved. Historically, it was observed that a pumping rate of approximately 80 gallons per minute (GPM) induced a drawdown of about 20 feet on each occasion when the pump was in operation. This drawdown value is consistent with drawdown measured during the aquifer test that was performed in January 2010. Groundwater was discharged at a similar rate (about 88 gpm) during this test. When the pump was turned off, water levels returned to static conditions.

5.0 ANNUAL SUMMARY

Facility construction was completed after the first quarter of 2014 and water production well PW-2 went online full-time for normal post-construction facility operation, with PW-0 on standby and PW-1 taken offline and sealed. Based on the groundwater elevation measurements collected manually through the 2014 calendar year, there has been negligible change in upgradient, onsite, and downgradient monitoring wells in both the Bouse Formation and the shallow alluvium aquifer. Groundwater elevations have been consistent pre- and post-construction.

The horizontal groundwater gradient has remained consistent through the 2014 calendar year, sloping at a gradient ranging between 0.0006 and 0.0009 feet per horizontal foot towards the east-southeast. The vertical gradient between the Bouse Formation and the shallower alluvium aquifer has remained consistent through the 2014 calendar year, ranging from 0.02 to 0.03 feet per vertical foot in the downwards direction.

Transducer data for the upgradient wells OBS-1 and TW-1 (which monitor groundwater elevations in the shallow and deep aquifers, respectively) display slight diurnal fluctuations and negligible seasonal fluctuations. The OBS-1 transducer displays a slight increase in groundwater elevations following sustained upgradient precipitation (generally following a minimum of two days of precipitation), after which groundwater elevations return to static conditions.

Downgradient well 23a has historically fluctuated in response to unknown site conditions, but has always remained within the action level of 5 feet of groundwater elevation change. During the 2014 calendar year, this well appears to be slightly more stable, but long-term trends are still developing. During 2014 groundwater elevation monitoring, field observations of this well have been made that suggest that water cascades into the well through the well screen (or other unknown entry point) intermittently.

Long-term groundwater elevation trends are still developing for monitoring wells 24-2 and 24-3, which were not monitored consistently in the past. The top of the casing on well 24-2 is broken and there is a buildup of sand in the casing near the bottom of the well, making accurate measurements difficult.

6.0 CONCLUSIONS

Based on the available data, it does not appear that the GSEP has negatively impacted the groundwater elevation in the CVGB or within a 10-mile radius of the GSEP facility to date. All calculated groundwater elevations are generally stable with minor fluctuations that are less than the action level of 5 feet of drawdown. Wells within the GLMP generally do not display a seasonal correlation, but minor diurnal fluctations exist based upon transducer data from Wells OBS-1 and TW-1. Production well activity has not been directly correlated to any decrease in groundwater elevation at the GSEP beyond that measured in the production wells during pumping.

7.0 REFERENCES

ASTM, 1993, Test Method for Determining Subsurface Liquid Levels in a Borehole or Monitoring Well (Observation Well). ASTM D4750-87.

California Energy Commission (CEC), 2010, Genesis Solar Energy Project Commission Decision. October 12, 2010.

Genesis Solar, LLC, 2009, Application for Certification, Genesis Solar Energy Project, Riverside County, California. August 31, 2009.

Genesis Solar, LLC, 2010, Plan of Development C 48880, Genesis Solar Energy Project, Riverside County, California. October 2010.

TABLES

Table 1
INVENTORY OF WELLS IN THE GROUNDWATER MONITORING AREA
Genesis Solar Energy Project, Riverside County, California

Well ID	State Well Number	Other Name	Owner	Installation Date	Use/Status	Well Casing Diameter (inches)	Approximate Ground Surface Elevation (feet amsl)	Top Of Casing Elevation (feet amsl)	Well Depth (feet bgs)	Screened Interval (feet bgs)	Geologic Unit
WELLS INCLUDED IN THE GROUNDWATER MONITORING PROGRAM											
OBS-1 [1]	--	Shallow Observation Well 1	Genesis Solar, LLC	5/9/2009	Monitoring / Active	5	385.857	388.3	160	100 to 150	Alluvium
OBS-2-270 [1,2]	--	Nested Observation Well 2	Genesis Solar, LLC	7/2/2009	Buried Transducer / Active	--	385.617	388.14	270	265 to 275	Bouse Formation
OBS-2-315 [1,2]	--	Nested Observation Well 2	Genesis Solar, LLC	7/2/2009	Buried Transducer / Active	--	385.617	388.14	315	304 to 327	Bouse Formation
OBS-2-370 [1,2]	--	Nested Observation Well 2	Genesis Solar, LLC	7/2/2009	Buried Transducer / Active	--	385.617	388.14	370	359 to 374	Bouse Formation
OBS-2-400 [1,2]	--	Nested Observation Well 2	Genesis Solar, LLC	7/2/2009	Buried Transducer / Active	--	385.617	388.14	400	387 to 418	Bouse Formation
TW-1 [1]	--	Test Well 1	Genesis Solar, LLC	5/22/2009	Monitoring / Active	5	385.91	387.4	565	340 to 564	Bouse Formation
TW-2 [1]	--	Test Well 2	Genesis Solar, LLC	12/9/2009	Monitoring and Dust Control / Active	5	390.003	393.47	1,841	793-873, 1042-1123, 1439-1601, 1739-1820	Bouse Formation / Fanglomerate
PW-0	--	Production Well 0	Genesis Solar, LLC	7/9/2011	Production Well	10	--	--	1,251	882-1002, 1226-1251	Bouse Formation / Fanglomerate
PW-1	--	Production Well 1	Genesis Solar, LLC	8/14/2011	Production Well	10	--	--	1,360	930-950, 990-1000, 1040-1100, 1120-1140, 1160-1200, 1260-1360	Bouse Formation / Fanglomerate
PW-2	--	Production Well 2	Genesis Solar, LLC	9/15/2011	Production Well	10	--	--	1,125	770-930, 980-1120	Bouse Formation
DM-1	--	Detection Monitoring Well 1	Genesis Solar, LLC	2/22/2012	Monitoring / Active	4	--	391.49	120	100 to 120	Alluvium
DM-2	--	Detection Monitoring Well 2	Genesis Solar, LLC	2/21/2012	Monitoring / Active	4	--	391.32	120	100 to 120	Alluvium
DM-3	--	Detection Monitoring Well 3	Genesis Solar, LLC	2/20/2012	Monitoring / Active	4	--	388.34	120	100 to 120	Alluvium
14 [1,3]	6S/19E-32	--	Lorne Froats (AZCA Drilling)	5/1/1991	Domestic/ Irrigation/ Dust Control	12 to 10	393.548	388.14	982 (obstructed at 450)	890 to 940	Fanglomerate
23a [1,4]	6S/20E-33C1	CalTrans Well @ WWRS	CalTrans	Unknown	Water Supply / Inactive	8	397.28	392.1	1,825	1800-1825	Fanglomerate
24-1 [1,5]	6S/20E-33	SCG Anode Well	So Cal Gas	4/29/1989	Anode / Inactive	2	389.3	389.4	435	235 to 435	Alluvium/Bouse Formation
24-2 [5]	6S/20E-33	SCG Anode Well	So Cal Gas	Unknown	Anode / Inactive	1	389.09	388.86	Obstructed at 373 feet	235 to 435	Alluvium/Bouse Formation
24-3 [5]	6S/20E-33	SCG Anode Well	So Cal Gas	Unknown	Anode / Inactive	1	388.2	392.04	Unknown	--	Alluvium/Bouse Formation
ADDITIONAL WELLS IN THE CHUCKWALLA VALLEY GROUNDWATER BASIN WITHIN 10 MILES OF THE SITE FOR WHICH MONITORING DATA IS AVAILABLE											
2	6S/18E-36E1	- -	CA Jojoba Research and Development	12/18/1981	Irrigation	10 to 6	424	--	940	250 to 290 770 to 810	Alluvium/Bouse Formation
3	6S/18E-29	Siddall Well	Agra Energy Corp.	2/26/1982	Irrigation	20 to 8	498	--	957	560 to 940	Bouse Formation
4	6S/19E-19J1	--	--	--	Unused	12	354	--	--	--	--
9	6S/19E-28R1	--	--	--	Unused	--	354	--	--	--	--
15	6S/19E-32K1	--		--	--	12.5	390.2	--	Obstructed at 526 feet	--	Bouse Formation
16	6S/19E-32K2	--		--	--	10.5	390	--	Obstructed at 297 feet	--	Bouse Formation
22	6S/20E-33L1	--	--	--	Unknown / Destroyed	--	--	--	--	--	Bouse Formation
23	6S/20E-33C1	--	--	--	Unknown / Destroyed	10	392	--	400	--	--
26	7S/18E-14F1	--	U.S. AgriResearch and Development	12/26/1982	Irrigation	16 to 10	562.58	--	1,000 (obstructed at 952 feet)	410 to 630 750 to 770 810 to 870	Alluvium/Bouse Formation
27	7S/18E-11N1	--	--	--	Unused	16	555	--	486.4	--	Bouse Formation
28	7S/18E-11R1	--	--	--	Unused	16	520	--	779.4	--	Bouse Formation
29	7S/18E-14H1	--	U.S. AgriResearch and Development	1/16/1983	Irrigation	10	545.91	--	985 (obstructed at 950 feet)	420 to 460, 500 to 520, 540 to 580, 620-820, 840-990	Bouse Formation
31	7S/19E-4R1	Teaque Well	--	--	Unused	12	423.89	--	242.2	--	Alluvium
32	7S/20E-4R1	Vada McBride	--	--	Unused	16	418	--	315.7	--	Bouse Formation
33	7S/20E-16M1	--	CA Department of Corrections	--	--	30 to 16	456.02	--	1,200	690 to 1190	Bouse Formation/ Fanglomerate
34	7S/20E-17L1	WP-4	CA Department of Corrections	9/8/1992	Public Water Supply	24	458.3	--	1,200	690 to 1190	Bouse Formation/ Fanglomerate
35	7S/20E-17K1	--	CA Department of Corrections	12/20/1989	--	30 to 16	456.48	--	1,200	690 to 1190	Bouse Formation/ Fanglomerate
36 [6]	7S/20E-17G1	--	CA Department of Corrections	12/30/1987	Industrial	30 to 16 to 10	443.5	--	1,200	690 to 1190	Bouse Formation/ Fanglomerate
37 [6]	7S/20E-17C1	78, North Well	CA Department of Corrections	7/28/1981	Irrigation	14-10	433.09	--	1,050	750 to 1,050	Bouse Formation/ Fanglomerate
39	7S/20E-18H1	--	CA Department of Corrections	--	--	--	442.9	--	1,139	--	Bouse Formation/ Fanglomerate
40	7S/20E-18K1	WP-6	CA Department of Corrections	11/4/1992	Public Water Supply	15 to 10	449.4	--	1,200	690 to 1,200	Bouse Formation/ Fanglomerate
41	7S/20E-18R1	WP-5	CA Department of Corrections	10/24/1992	Public Water Supply	13.5 to 10	453.6	--	1,160	--	Fanglomerate
42	7S/20E-20B1	79 / Observation Well 3	--	6/4/1905	Irrigation	16 to 12	470	--	1,100	738 to 1,100	Bouse Formation/ Fanglomerate

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43	7S/20E-28C1	7S/20E-28F1/80	Jojoba Inc.	3/15/1982	Irrigation	10 to 8	505.6	--	830	510 to 600 and 680 to 780	Bouse Formation
44	7S/20E-28C2	--	Jojoba Southwest	11/30/1989	Irrigation	16 to 12	505.3	--	1,100	700 to 1,100	Bouse Formation/ Fanglomerate
47	8S/20E-10N2	60	--	1984	--	4	621	--	872	500 to 580, 620 to 640, 710 to 850	Bouse Formation
50	6S/17E-3M1	--	--	--	--	--	566	--	818	--	Bouse Formation
54	8S/20E-28N1	--	--	--	--	--	654.5	--	500	--	Bouse Formation
55	7S/20E-1M1	CWV1#1	USGS	1/23/2012	Exploratory	2	415.4	--	993	973 to 993	Bouse Formation
56	7S/20E-1M2	CWV1#2	USGS	1/23/2012	Exploratory	2	415.4	--	505	485 to 505	Pinto Formation
57	7S/20E-1M3	CWV1#3	USGS	1/23/2012	Exploratory	2	415.4	--	230	210 to 230	Alluvium
ADDITIONAL WELLS IN THE CHUCKWALLA VALLEY GROUNDWATER BASIN WITHIN 10 MILES OF THE SITE FOR WHICH MONITORING DATA ARE NOT AVAILABLE											
1	5S/20E-16M1	McCoy Spring and DWR-17	--	--	Unused	--	889	--	--	--	--
5	6S/19E-25P1	--	--	--	Unknown / Destroyed	10	360	--	85.7	--	Alluvium
6	6S/19E-25R1	--	--	--	Unknown / Destroyed	10	360	--	61.9	--	Alluvium
7	6S/19E-25	Boreholes 1A, 1B, 1C	USGS	1978	Exploratory Borehole / Abandoned	--	358	--	--	--	--
8	6S/19E-26Z1	--	--	--	Unknown / Destroyed	--	--	--	--	--	--
10	6S/19E-29E1	--	--	--	Destroyed/ Collapsed	6	377	--	Obstructed at 19.7	--	--
11	6S/19E-30H1	--	--	--	Destroyed	6	370	--	28.7	--	Alluvium
12	6S/19E-31Z1	--	--	--	Destroyed	--	--	--	--	--	--
13	6S/19E-32	--	Jacado Agri Corp.	6/27/1982	Destroyed	22 to 18 to 12	392	--	732	307 to 327 365 to 732	Bouse Formation
17	6S/19E-33A1	Hopkins Well and DWR-33X1	--	1911	Destroyed	12 to 8	361	--	1,200 (obstructed at 267 feet)	1,175 to 1,200	Fanglomerate
18	6S/19E-34	--	So Cal Gas	4/29/1989	Anode	1	368	--	400	200 to 400	Alluvium/Bouse Formation
19	6S/19E-34	--	So Cal Gas	7/15/1981	Other	--	369	--	274	0 to 274	Alluvium/Bouse Formation
20	6S/19E-36A1	--	--	--	Destroyed	10	365	--	64.8	--	Alluvium
21	6S/20E-30Z1	Ford Well	--	--	Stock / Destroyed	10	--	--	--	--	--
25	6S/20E-33	--	So Cal Gas	7/20/1981	Monitoring / Presumed Destroyed	1	397	--	278	0 to 278	Alluvium/Bouse Formation
30	7S/18E-14H1	--	--	--	Destroyed	6	546	--	123.9	--	Alluvium
38	7/20E-17C2	Observation Well 1	CA Department of Corrections	6/20/1986	Monitoring / Presumed Destroyed	1 1/4	433	--	1,040	795 to 815 and 995 to 1,015	Bouse Formation/ Fanglomerate
45	7S/20E-28	--	Chuckwalla Jojoba inc Great American Securities	6/6/1989	Test Hole/Abandoned	--	505	--	825	--	--
46	7S/20E-27L1	--	--	--	Destroyed	8	517	--	53.6	- -	Alluvium

Notes:
-- = information not available or unknown
amsl = above mean sea level
bgs = below ground surface
1. Wells were surveyed on February 8 & 9, 2011. Ground surface elevation survey measurement taken at top of concrete pad.
2. Nested pressure transducer buried in place.
3. Well is obstructed at 450 feet and therefore not suitable for groundwater quality monitoring. Used for groundwater level monitoring only.
4. Well completion and screened interval determined by video log performed on 11/09/2010
5. Anode well completed with Coke Breeze and not considered to be suitable for water quality sampling and used for groundwater level monitoring program only.
6. No access port for groundwater level monitoring; used for groundwater quality monitoring only.

Table 2
GROUNDWATER LEVEL MEASUREMENTS
Genesis Solar Energy Project, Riverside County, California

Well ID	Date	Source	Top of Casing Elevation (feet amsl) [1]	Depth to Water (feet below TOC) [2]	Groundwater Elevation (feet amsl)	Comments / Use
WELLS INCLUDED IN THE GROUNDWATER LEVEL MONITORING PROGRAM						
TW-1	5/23/2009	WorleyParsons	387.40	89.75	297.65	Monitoring
	11/10/2010	WorleyParsons		86.65	300.75	Monitoring
	2/8/2011	WorleyParsons		86.67	300.73	Monitoring
	6/8/2011	WorleyParsons		86.58	300.82	Monitoring
	9/25/2011	WorleyParsons		86.48	300.92	Monitoring
	12/13/2011	WorleyParsons		86.25	301.15	Monitoring
	2/21/2012	WorleyParsons		86.58	300.82	Monitoring
	5/23/2012	WorleyParsons		86.43	300.97	Monitoring
	7/26/2012	WorleyParsons		86.47	300.93	Monitoring
	10/23/2012	WorleyParsons		86.43	300.97	Monitoring
	3/29/2013	WorleyParsons		86.46	300.94	Monitoring
	6/20/2013	WorleyParsons		86.43	300.97	Monitoring
	8/13/2013	WorleyParsons		86.43	300.97	Monitoring
	11/14/2013	WorleyParsons		86.53	300.87	Monitoring
	2/26/2014	WorleyParsons		86.49	300.91	Monitoring
	5/20/2014	Northstar		86.47	300.93	Monitoring
	8/8/2014	Northstar		86.46	300.94	Monitoring
	12/4/2014	Northstar		86.50	300.90	Monitoring
TW-2	1/5/2010	WorleyParsons	393.47	132.37	261.10	Monitoring
	11/9/2010	WorleyParsons		127.09	266.38	Monitoring
	1/19/2011	WorleyParsons		125.68	267.79	Monitoring
	2/8/2011	WorleyParsons		Pumping		Pumping
	6/9/2011	WorleyParsons		126.46	267.01	Monitoring
	9/26/2011	WorleyParsons		128.04	265.43	Monitoring
	12/14/2011	WorleyParsons		127.75	265.72	Monitoring
	2/21/2012	WorleyParsons		127.85	265.62	Monitoring
	5/24/2012	WorleyParsons		127.88	265.59	Monitoring
	7/26/2012	WorleyParsons		128.09	265.38	Monitoring
	10/23/2012	WorleyParsons		127.87	265.60	Monitoring
	3/28/2013	WorleyParsons		127.22	266.25	Monitoring
	6/20/2013	WorleyParsons		127.52	265.95	Monitoring
	8/13/2013	WorleyParsons		127.88	265.59	Monitoring
	11/12/2013	WorleyParsons		128.07	265.40	Monitoring
	2/26/2014	WorleyParsons		127.00	266.47	Monitoring
	5/20/2014	Northstar		127.18	266.29	Monitoring
	8/8/2014	Northstar		127.40	266.07	Monitoring
	12/4/2014	Northstar		127.22	266.25	Monitoring
OBS-1	5/25/2009	WorleyParsons	388.30	79.22	309.08	Monitoring
	11/10/2010	WorleyParsons		77.67	310.63	Monitoring
	2/8/2011	WorleyParsons		77.98	310.32	Monitoring
	6/8/2011	WorleyParsons		77.99	310.31	Monitoring
	9/25/2011	WorleyParsons		78.08	310.22	Monitoring
	12/13/2011	WorleyParsons		78.29	310.01	Monitoring
	2/21/2012	WorleyParsons		78.17	310.13	Monitoring
	5/23/2012	WorleyParsons		78.14	310.16	Monitoring
	7/26/2012	WorleyParsons		78.15	310.15	Monitoring
	10/23/2012	WorleyParsons		78.09	310.21	Monitoring
	3/29/2013	WorleyParsons		78.06	310.24	Monitoring
	6/20/2013	WorleyParsons		78.05	310.25	Monitoring
	8/13/2013	WorleyParsons		78.07	310.23	Monitoring
	11/14/2013	WorleyParsons		78.15	310.15	Monitoring
	2/26/2014	WorleyParsons		78.12	310.18	Monitoring
	5/20/2014	Northstar		78.06	310.24	Monitoring
	8/8/2014	Northstar		78.05	310.25	Monitoring
	12/4/2014	Northstar		78.10	310.20	Monitoring
OBS-2-270 [7]	7/9/2009	WorleyParsons	388.14	78.75	309.39	Monitoring
	11/10/2010	WorleyParsons		80.56	307.58	Monitoring
	2/8/2011	WorleyParsons		80.61	307.53	Monitoring
	2/8/2011	WorleyParsons		80.68	307.46	Monitoring
	9/25/2011	WorleyParsons		80.77	307.37	Monitoring
	12/14/2011	WorleyParsons		NM [3]		Monitoring
	2/21/2012	WorleyParsons		80.47	307.67	Monitoring
	5/25/2012	WorleyParsons		81.28	306.86	Monitoring
	7/26/2012	WorleyParsons		81.00	307.14	Monitoring
	10/23/2012	WorleyParsons		81.01	307.13	Monitoring
	3/29/2013	WorleyParsons		80.99	307.15	Monitoring

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Well ID	Date	Source	Top of Casing Elevation (feet amsl) [1]	Depth to Water (feet below TOC) [2]	Groundwater Elevation (feet amsl)	Comments / Use
	6/20/2013	WorleyParsons		NM[3]		Monitoring
	8/13/2013	WorleyParsons		NM[3]		Monitoring
	11/12/2013	WorleyParsons		81.24	306.90	Monitoring
	2/26/2014	WorleyParsons		81.48	306.66	Monitoring
	7/9/2009	WorleyParsons		80.89	307.25	Monitoring
	11/10/2010	WorleyParsons		82.51	305.63	Monitoring
	2/8/2011	WorleyParsons		82.61	305.53	Monitoring
	2/8/2011	WorleyParsons		82.83	305.31	Monitoring
	9/25/2011	WorleyParsons		83.03	305.11	Monitoring
	12/14/2011	WorleyParsons		NM3		Monitoring
	2/21/2012	WorleyParsons		82.81	305.33	Monitoring
OBS-2-315 [7]	5/25/2012	WorleyParsons	388.14	NM[3]		Monitoring
	7/26/2012	WorleyParsons		83.38	304.76	Monitoring
	10/23/2012	WorleyParsons		83.43	304.71	Monitoring
	3/29/2013	WorleyParsons		83.45	304.69	Monitoring
	6/20/2013	WorleyParsons		NM[3]		Monitoring
	8/13/2013	WorleyParsons		NM[3]		Monitoring
	11/12/2013	WorleyParsons		83.74	304.40	Monitoring
	2/26/2014	WorleyParsons		83.96	304.18	Monitoring
	7/9/2009	WorleyParsons		82.46	305.68	Monitoring
	11/10/2010	WorleyParsons		84.60	303.54	Monitoring
	2/8/2011	WorleyParsons		85.01	303.13	Monitoring
	9/25/2011	WorleyParsons		85.24	302.90	Monitoring
	12/14/2011	WorleyParsons		NM[3]		Monitoring
	2/21/2012	WorleyParsons		85.05	303.09	Monitoring
	5/25/2012	WorleyParsons		85.84	302.30	Monitoring
OBS-2-370 [7]	7/26/2012	WorleyParsons	388.14	85.64	302.50	Monitoring
	10/23/2012	WorleyParsons		85.70	302.44	Monitoring
	3/29/2013	WorleyParsons		85.75	302.39	Monitoring
	6/20/2013	WorleyParsons		NM[3]		Monitoring
	8/13/2013	WorleyParsons		NM[3]		Monitoring
	11/12/2013	WorleyParsons		86.05	302.09	Monitoring
	2/26/2014	WorleyParsons		86.27	301.87	Monitoring
	7/9/2009	WorleyParsons		86.26	301.88	Monitoring
	11/10/2010	WorleyParsons		87.34	300.80	Monitoring
	2/8/2011	WorleyParsons		87.41	300.73	Monitoring
	2/8/2011	WorleyParsons		87.57	300.57	Monitoring
	9/25/2011	WorleyParsons		87.73	300.41	Monitoring
	12/14/2011	WorleyParsons		NM[3]		Monitoring
	2/21/2012	WorleyParsons		87.47	300.67	Monitoring
	5/25/2012	WorleyParsons		88.20	299.94	Monitoring
OBS-2-400 [7]	7/26/2012	WorleyParsons	388.14	87.96	300.18	Monitoring
	10/23/2012	WorleyParsons		87.97	300.17	Monitoring
	3/29/2013	WorleyParsons		88.20	299.94	Monitoring
	6/20/2013	WorleyParsons		NM[3]		Monitoring
	8/13/2013	WorleyParsons		NM[3]		Monitoring
	11/12/2013	WorleyParsons		88.12	300.02	Monitoring
	2/26/2014	WorleyParsons		88.31	299.83	Monitoring
	5/1/1991	DWR Well Records		109.71	278.43	Domestic / Irrigation / Dust Control
	2/8/2011	WorleyParsons		77.98	310.16	Monitoring
	6/8/2011	WorleyParsons		100.98	287.16	Monitoring
	9/26/2011	WorleyParsons		100.65	287.49	Monitoring
	12/14/2011	WorleyParsons		100.87	287.27	Monitoring
	2/21/2012	WorleyParsons		100.85	287.29	Monitoring
	5/24/2012	WorleyParsons		100.70	287.44	Monitoring
	7/26/2012	WorleyParsons		100.72	287.42	Monitoring
14	10/23/2012	WorleyParsons	388.14	100.66	287.48	Monitoring
	3/28/2013	WorleyParsons		100.49	287.65	Monitoring
	6/20/2013	WorleyParsons		100.46	287.68	Monitoring
	8/13/2013	WorleyParsons		100.46	287.68	Monitoring
	11/12/2013	WorleyParsons		NM[5]		Monitoring
	2/26/2014	WorleyParsons		100.39	287.75	Monitoring
	5/20/2014	Northstar		100.35	287.79	Monitoring
	8/8/2014	Northstar		100.26	287.88	Monitoring

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Well ID	Date	Source	Top of Casing Elevation (feet amsl) [1]	Depth to Water (feet below TOC) [2]	Groundwater Elevation (feet amsl)	Comments / Use
	12/4/2014	Northstar		100.25	287.89	Monitoring
23a	11/11/2010	WorleyParsons	392.1	138.05	254.05	Monitoring
	2/8/2011	WorleyParsons		137.12	254.98	Monitoring
	6/7/2011	WorleyParsons		137.58	254.52	Monitoring
	9/26/2011	WorleyParsons		138.01	254.09	Monitoring
	12/14/2011	WorleyParsons		138.88	253.22	Monitoring
	2/22/2012	WorleyParsons		137.70	254.40	Monitoring
	5/24/2012	WorleyParsons		137.74	254.36	Monitoring
	7/26/2012	WorleyParsons		137.76	254.34	Monitoring
	10/23/2012	WorleyParsons		137.94	254.16	Monitoring
	3/28/2013	WorleyParsons		137.27	254.83	Monitoring
	6/20/2013	WorleyParsons		137.77	254.33	Monitoring
	8/13/2013	WorleyParsons		137.81	254.29	Monitoring
	11/12/2013	WorleyParsons		138.01	254.09	Monitoring
	2/25/2014	WorleyParsons		136.90	255.20	Monitoring
	5/20/2014	Northstar		137.15	254.95	Monitoring
	8/8/2014	Northstar		137.31	254.79	Monitoring
	12/4/2014	Northstar		137.18	254.92	Monitoring
24-1	2/8/2011	WorleyParsons	389.4	123.66	265.74	Monitoring
	6/8/2011	WorleyParsons		126.71	262.69	Monitoring
	9/26/2011	WorleyParsons		127.15	262.25	Monitoring
	12/13/2011	WorleyParsons		126.98	262.42	Monitoring
	2/22/2012	WorleyParsons		127.20	262.20	Monitoring
	5/23/2012	WorleyParsons		127.14	262.26	Monitoring
	7/26/2012	WorleyParsons		127.31	262.09	Monitoring
	10/23/2012	WorleyParsons		127.21	262.19	Monitoring
	3/28/2013	WorleyParsons		126.73	262.67	Monitoring
	6/19/2013	WorleyParsons		127.95	261.45	Monitoring
	8/14/2013	WorleyParsons		127.18	262.22	Monitoring
	11/13/2013	WorleyParsons		127.31	262.09	Monitoring
	2/25/2014	WorleyParsons		125.70	263.70	Monitoring
	5/22/2014	Northstar		126.84	262.56	Monitoring
	8/8/2014	Northstar		126.91	262.49	Monitoring
	12/5/2014	Northstar		126.91	262.49	Monitoring
24-2	2/8/2011	WorleyParsons	388.86	124.91	263.95	Monitoring
	10/23/2011	WorleyParsons		125.69	263.17	Monitoring
	6/19/2013	WorleyParsons		125.40	263.46	Monitoring
	8/14/2013	WorleyParsons		126.60	262.26	Monitoring
	5/22/2014	Northstar		125.82	263.04	Monitoring
	8/8/2014	Northstar		125.33	263.53	Monitoring
	12/5/2014	Northstar		125.95	262.91	Monitoring
24-3	2/8/2011	WorleyParsons	392.04	126.45	265.59	Monitoring
	10/23/2011	WorleyParsons		124.48	267.56	Monitoring
	6/19/2013	WorleyParsons		124.15	267.89	Monitoring
	8/14/2013	WorleyParsons		124.44	267.60	Monitoring
	5/22/2014	Northstar		124.00	268.04	Monitoring
	8/8/2014	Northstar		124.07	267.97	Monitoring
	12/5/2014	Northstar		124.05	267.99	Monitoring
PW-0	12/14/2011	WorleyParsons	383.92	NM[4]		Production/Monitoring
	2/23/2012	WorleyParsons		NM[4]		Production/Monitoring
	5/23/2012	WorleyParsons		NM[4]		Production/Monitoring
	7/26/2012	WorleyParsons		NM[4]		Production/Monitoring
	10/23/2012	WorleyParsons		Pumping		Production/Monitoring
	3/28/2013	WorleyParsons		67.71	316.21	Production/Monitoring
	6/19/2013	WorleyParsons		Pumping		Production/Monitoring
	8/13/2013	WorleyParsons		100.49	283.43	Production/Monitoring
	11/13/2013	WorleyParsons		118.10	265.82	Production/Monitoring
	2/26/2014	WorleyParsons		98.46	285.46	Production/Monitoring
	5/20/2014	Northstar		99.60	284.32	Production/Monitoring
	8/8/2014	Northstar		99.06	284.86	Production/Monitoring
	12/4/2014	Northstar		99.65	284.27	Production/Monitoring
	12/14/2011	WorleyParsons		Pumping		Production/Monitoring
	2/23/2012	WorleyParsons		100.84	283.26	Production/Monitoring
	5/23/2012	WorleyParsons		Pumping		Production/Monitoring

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Well ID	Date	Source	Top of Casing Elevation (feet amsl) [1]	Depth to Water (feet below TOC) [2]	Groundwater Elevation (feet amsl)	Comments / Use
PW-1	7/26/2012	WorleyParsons	384.10	101.09		Production/Monitoring
	10/23/2012	WorleyParsons		100.89	283.21	Production/Monitoring
	3/28/2013	WorleyParsons		100.60	283.50	Production/Monitoring
	6/19/2013	WorleyParsons		Pumping		Production/Monitoring
	8/13/2013	WorleyParsons		109.35	274.75	Production/Monitoring
	11/13/2013	WorleyParsons		99.89	284.21	Production/Monitoring
	2/26/2014	WorleyParsons		98.49	285.61	Production/Monitoring
	5/20/2014	Northstar		NM[6]		Production/Monitoring
	8/8/2014	Northstar		NM[6]		Production/Monitoring
	12/4/2014	Northstar		NM[6]		Production/Monitoring
PW-2	12/14/2011	WorleyParsons	384.10	Pumping		Production/Monitoring
	2/23/2012	WorleyParsons		Pumping		Production/Monitoring
	5/23/2012	WorleyParsons		Pumping		Production/Monitoring
	7/26/2012	WorleyParsons		101.30	282.80	Production/Monitoring
	10/23/2012	WorleyParsons		Pumping		Production/Monitoring
	3/28/2013	WorleyParsons		Pumping		Production/Monitoring
	6/19/2013	WorleyParsons		Pumping		Production/Monitoring
	8/13/2013	WorleyParsons		101.75	282.35	Production/Monitoring
	11/12/2013	WorleyParsons		102.69	281.41	Production/Monitoring
	2/26/2014	WorleyParsons		100.52	283.58	Production/Monitoring
	5/20/2014	Northstar		Pumping		Production/Monitoring
	8/8/2014	Northstar		Pumping		Production/Monitoring
	12/4/2014	Northstar		Pumping		Production/Monitoring
DM-1	2/27/2012	WorleyParsons	391.49	106.63	284.86	Monitoring
	5/24/2012	WorleyParsons		107.11	284.38	Monitoring
	7/26/2012	WorleyParsons		107.10	284.39	Monitoring
	11/14/2012	WorleyParsons		108.15	283.34	Monitoring
	3/29/2013	WorleyParsons		107.34	284.15	Monitoring
	6/19/2013	WorleyParsons		107.19	284.30	Monitoring
	8/13/2013	WorleyParsons		107.07	284.42	Monitoring
	11/12/2013	WorleyParsons		107.22	284.27	Monitoring
	2/26/2014	WorleyParsons		107.13	284.36	Monitoring
	5/22/2014	Northstar		107.05	284.44	Monitoring
	8/8/2014	Northstar		107.11	284.38	Monitoring
	12/4/2014	Northstar		107.03	284.46	Monitoring
DM-2	2/27/2012	WorleyParsons	391.32	106.92	284.40	Monitoring
	5/24/2012	WorleyParsons		107.37	283.95	Monitoring
	7/26/2012	WorleyParsons		107.33	283.99	Monitoring
	11/14/2012	WorleyParsons		108.33	282.99	Monitoring
	3/29/2013	WorleyParsons		107.59	283.73	Monitoring
	6/19/2013	WorleyParsons		107.41	283.91	Monitoring
	8/13/2013	WorleyParsons		107.31	284.01	Monitoring
	11/12/2013	WorleyParsons		107.63	283.69	Monitoring
	2/26/2014	WorleyParsons		107.40	283.92	Monitoring
	5/22/2014	Northstar		107.28	284.04	Monitoring
	8/8/2014	Northstar		107.28	284.04	Monitoring
	12/4/2014	Northstar		107.43	283.89	Monitoring
DM-3	2/27/2012	WorleyParsons	388.34	103.85	284.49	Monitoring
	5/24/2012	WorleyParsons		104.35	283.99	Monitoring
	7/26/2012	WorleyParsons		104.28	284.06	Monitoring
	11/14/2012	WorleyParsons		105.25	283.09	Monitoring
	3/29/2013	WorleyParsons		104.35	283.99	Monitoring
	6/19/2013	WorleyParsons		104.20	284.14	Monitoring
	8/13/2013	WorleyParsons		104.31	284.03	Monitoring
	11/12/2013	WorleyParsons		104.43	283.91	Monitoring
	2/26/2014	WorleyParsons		104.31	284.03	Monitoring
	5/22/2014	Northstar		104.20	284.14	Monitoring
	8/8/2014	Northstar		104.21	284.13	Monitoring
	12/4/2014	Northstar		104.39	283.95	Monitoring
ADDITIONAL WELLS IN THE CHUCKWALLA VALLEY GROUNDWATER BASIN WITHIN 10 MILES OF THE SITE FOR WHICH GROUNDWATER LEVEL DATA IS AVAILABLE						
2	5/19/1961	DWR, 1963	424	140.00	284.00	Irrigation
3	2/26/1982	DWRWell Records	498	180.00	318.00	Irrigation
4	7/24/1961	DWR, 1963	354	60.05	293.95	Unused
9	9/16/1990	USGS-NWIS	354	81.36	272.64	
	9/24/1990	USGS-NWIS		81.56	272.44	Unknown

Table 2
GROUNDWATER LEVEL MEASUREMENTS
Genesis Solar Energy Project, Riverside County, California

Well ID	Date	Source	Top of Casing Elevation (feet amsl) [1]	Depth to Water (feet below TOC) [2]	Groundwater Elevation (feet amsl)	Comments / Use
	2/13/1992	USGS-NWIS		81.20	272.80	
	2/17/1992	USGS-NWIS		104.36	285.84	
15	3/15/2000	USGS-NWIS	390.2	97.36	292.84	Unknown
	9/23/2009	WorleyParsons		97.00	293.20	
16	2/17/1992	USGS-NWIS	390	110.39	279.61	Unknown
	9/23/2009	WorleyParsons		103.00	287.00	
22	2/4/2002	USGS-NWIS	387.6	125.29	262.31	Unknown
23	9/26/1990	USGS-NWIS	392.1	134.10	258.00	Unknown
	2/10/1992	USGS-NWIS		134.80	257.30	
	12/26/1982	USGS-NWIS		300.00	262.60	
26	2/13/1992	USGS-NWIS	562.6	270.28	292.32	Irrigation
	3/15/2000	USGS-NWIS		269.85	292.75	
	9/23/2009	WorleyParsons		282.00	280.60	
27	6/19/1961	DWR, 1963	555	258.83	296.17	Unused
28	6/19/1961	DWR, 1963	520	21.65	498.35	Unused
	1/16/1983	USGS-NWIS		270.00	275.90	
	2/13/1992	USGS-NWIS		257.61	288.29	
29	3/15/2000	USGS-NWIS	545.9	257.22	288.68	Irrigation
	9/23/2009	WorleyParsons		250.00	295.90	
	4/28/2011	USGS-NWIS		257.83	288.07	
31	9/16/1990	USGS-NWIS	423.9	144.25	279.65	Unused
	3/29/2000	USGS-NWIS		144.41	279.49	
	6/12/1961	USGS-NWIS		151.83	266.17	
	10/10/1961	USGS-NWIS		151.09	266.91	
	11/8/1961	USGS-NWIS		151.03	266.97	
	1/10/1962	USGS-NWIS		151.04	266.96	
	3/8/1962	USGS-NWIS		150.89	267.11	
	4/9/1962	USGS-NWIS		150.73	267.27	
	5/7/1962	USGS-NWIS		150.83	267.17	
	10/31/1962	USGS-NWIS		150.90	267.10	
	3/13/1963	USGS-NWIS		150.84	267.16	
32	10/31/1963	USGS-NWIS	418	150.91	267.09	Unused
	3/19/1964	USGS-NWIS		150.77	267.23	
	11/25/1964	USGS-NWIS		151.13	266.87	
	3/18/1965	USGS-NWIS		151.21	266.79	
	11/18/1965	USGS-NWIS		151.40	266.60	
	3/2/1966	USGS-NWIS		150.66	267.34	
	10/27/1966	USGS-NWIS		150.89	267.11	
	3/16/1967	USGS-NWIS		150.92	267.08	
	10/25/1967	USGS-NWIS		150.86	267.14	
	10/23/1969	USGS-NWIS		150.89	267.11	
	4/30/1970	USGS-NWIS		150.95	267.05	
	1987	USGS-NWIS		202.25	255.25	
33	9/17/1990	USGS-NWIS	457.5	205.62	251.88	Unknown
	2/10/1992	USGS-NWIS		206.70	250.80	
	2/11/1992	USGS-NWIS		206.27	251.23	
34	10/8/1992	USGS-NWIS	458.3	213.00	245.30	Public Water Supply
	12/1987	USGS-NWIS		205.00	251.50	
35	2/10/1992	USGS-NWIS	456.5	200.50	256.00	Unknown
	2/11/1992	USGS-NWIS		199.07	257.43	
	2/11/1992	USGS-NWIS		199.60	256.90	
	12/1987	USGS-NWIS		203.00	240.50	
	9/17/1990	USGS-NWIS		189.05	254.45	
36	2/10/1992	USGS-NWIS	443.5	187.70	255.80	Public Water Supply
	2/10/1992	USGS-NWIS		186.20	257.30	
	3/16/2000	USGS-NWIS		199.24	244.26	
37	7/1/1981	Kennedy/Jenks/Chilton	433.09	163.00	270.09	Irrigation (abandoned)
	2/11/1992	USGS-NWIS		174.47	258.62	
	4/5/1961	USGS-NWIS		168.37	274.53	
	4/30/1970	USGS-NWIS		171.81	271.09	
	7/31/1979	USGS-NWIS		173.48	269.42	
	7/24/1980	USGS-NWIS		169.06	273.84	
	1/23/1981	USGS-NWIS		169.22	273.68	
39	9/23/1981	USGS-NWIS	442.9	169.23	273.67	Irrigation
	3/3/1982	USGS-NWIS		170.26	272.64	
	1/28/1983	USGS-NWIS		170.54	272.36	
	7/31/1984	USGS-NWIS		170.65	272.25	
	2/27/1985	USGS-NWIS		171.10	271.80	
	6/12/1985	USGS-NWIS		172.90	270.00	
	2/9/1992	USGS-NWIS		183.46	259.44	
40	10/30/1992	USGS-NWIS	449.4	193.00	256.40	Public Water Supply

Table 2
GROUNDWATER LEVEL MEASUREMENTS
Genesis Solar Energy Project, Riverside County, California

Well ID	Date	Source	Top of Casing Elevation (feet amsl) [1]	Depth to Water (feet below TOC) [2]	Groundwater Elevation (feet amsl)	Comments / Use
41	10/19/1992	USGS-NWIS	453.6	202.00	251.60	Public Water Supply
42	1/1/1982	Kennedy/Jenks/Chilton	470	197.00	273.00	Irrigation
	3/15/1982	USGS-NWIS		248.00	257.60	
	2/13/1992	USGS-NWIS		232.35	273.25	
	3/29/2000	USGS-NWIS		234.50	271.10	
	10/5/2000	USGS-NWIS		234.84	270.76	
	1/10/2001	USGS-NWIS		234.89	270.71	
	2/23/2001	USGS-NWIS		234.45	271.15	
	4/16/2001	USGS-NWIS		234.82	270.78	
	4/16/2001	USGS-NWIS		234.82	270.78	
	7/10/2001	USGS-NWIS		235.40	270.20	
	11/7/2001	USGS-NWIS		235.66	269.94	
	11/7/2001	USGS-NWIS		235.69	269.91	
	4/3/2002	USGS-NWIS		234.69	270.91	
	4/3/2002	USGS-NWIS		234.69	270.91	
	10/2/2002	USGS-NWIS		236.04	269.56	
	10/2/2002	USGS-NWIS		236.16	269.44	
	6/3/2003	USGS-NWIS		235.59	270.01	
	6/3/2003	USGS-NWIS		235.61	269.99	
	11/5/2003	USGS-NWIS		236.46	269.14	
	11/5/2003	USGS-NWIS		236.45	269.15	
	3/2/2004	USGS-NWIS		235.65	269.95	
	3/2/2004	USGS-NWIS		235.63	269.97	
	8/4/2004	USGS-NWIS		235.85	269.75	
	12/8/2004	USGS-NWIS		235.78	269.82	
	4/15/2005	USGS-NWIS		235.28	270.32	
	8/31/2005	USGS-NWIS		235.89	269.71	
	8/31/2005	USGS-NWIS		235.84	269.76	
	2/14/2006	USGS-NWIS		235.78	269.82	
	2/14/2006	USGS-NWIS		235.79	269.81	
	5/5/2006	USGS-NWIS		236.38	269.22	
	5/5/2006	USGS-NWIS		236.39	269.21	
	8/10/2006	USGS-NWIS		236.66	268.94	
	8/10/2006	USGS-NWIS		236.66	268.94	
	12/8/2006	USGS-NWIS		236.57	269.03	
	12/8/2006	USGS-NWIS		236.57	269.03	
	2/7/2007	USGS-NWIS		236.16	269.44	
	2/7/2007	USGS-NWIS		236.16	269.44	
	5/17/2007	USGS-NWIS		236.55	269.05	
43	5/17/2007	USGS-NWIS	505.6	236.56	269.04	Irrigation
	9/5/2007	USGS-NWIS		236.91	268.69	
	9/5/2007	USGS-NWIS		236.91	268.69	
	9/5/2007	USGS-NWIS		236.91	268.69	
	12/13/2007	USGS-NWIS		236.55	269.05	
	12/13/2007	USGS-NWIS		236.54	269.06	
	3/19/2008	USGS-NWIS		235.65	269.95	
	3/19/2008	USGS-NWIS		235.64	269.96	
	3/19/2008	USGS-NWIS		235.67	269.93	
	6/25/2008	USGS-NWIS		235.62	269.98	
	6/25/2008	USGS-NWIS		235.60	270.00	
	9/24/2008	USGS-NWIS		235.73	269.87	
	9/24/2008	USGS-NWIS		235.73	269.87	
	9/24/2008	USGS-NWIS		235.72	269.88	
	1/14/2009	USGS-NWIS		235.25	270.35	
	1/14/2009	USGS-NWIS		235.26	270.34	
	4/16/2009	USGS-NWIS		235.28	270.32	
	4/16/2009	USGS-NWIS		235.29	270.31	
	7/30/2009	USGS-NWIS		235.80	269.80	
	7/30/2009	USGS-NWIS		235.79	269.81	
	10/29/2009	USGS-NWIS		235.61	269.99	
	10/29/2009	USGS-NWIS		235.60	270.00	
	1/20/2010	USGS-NWIS		235.98	269.62	
	1/20/2010	USGS-NWIS		235.99	269.61	
	4/23/2010	USGS-NWIS		235.26	270.34	
	4/23/2010	USGS-NWIS		235.26	270.34	
	7/22/2010	USGS-NWIS		235.67	269.93	
	11/4/2010	USGS-NWIS		235.71	269.89	
	11/4/2010	USGS-NWIS		235.73	269.87	
	1/13/2011	USGS-NWIS		235.27	270.33	
	4/28/2011	USGS-NWIS		235.12	270.48	
	10/18/2011	USGS-NWIS		235.48	270.12	

Table 2

GROUNDWATER LEVEL MEASUREMENTS

Genesis Solar Energy Project, Riverside County, California

Well ID	Date	Source	Top of Casing Elevation (feet amsl) [1]	Depth to Water (feet below TOC) [2]	Groundwater Elevation (feet amsl)	Comments / Use
	5/9/2012	USGS-NWIS		235.25	270.35	
	5/11/2012	USGS-NWIS		235.24	270.36	
	10/5/2012	USGS-NWIS		235.65	269.95	
	2/12/2013	USGS-NWIS		235.36	270.24	
	8/29/2013	USGS-NWIS		235.62	269.98	
	11/21/2013	USGS-NWIS		235.36	270.24	
	5/7/2014	USGS-NWIS		235.08	270.52	
44	11/29/1989	USGS-NWIS	505.3	234.00	271.30	Irrigation
47	2/14/1984	USGS-NWIS	580.90	300.00	280.90	Unknown
	9/28/1990	USGS-NWIS		299.61	281.29	
	2/9/1992	USGS-NWIS		299.69	281.21	
	3/30/2000	USGS-NWIS		300.05	280.85	
50	4/7/1961	USGS-NWIS	566	189.85	376.15	Unknown
	4/20/1961	USGS-NWIS		189.98	376.02	
54	1985-05	USGS-NWIS	654.5	360.00	294.50	Unknown
	9/28/1990	USGS-NWIS		369.19	285.31	
	2/10/1992	USGS-NWIS		369.15	285.35	
	3/30/2000	USGS-NWIS		369.08	285.42	
55	1/23/2012	USGS-NWIS	415.4	162.60	252.80	Exploratory
	5/9/2012	USGS-NWIS		162.57	252.83	
56	1/23/2012	USGS-NWIS	415.4	159.69	255.71	Exploratory
	5/9/2012	USGS-NWIS		159.89	255.51	
57	1/23/2012	USGS-NWIS	415.4	154.20	261.20	Exploratory
	5/9/2012	USGS-NWIS		154.28	261.12	

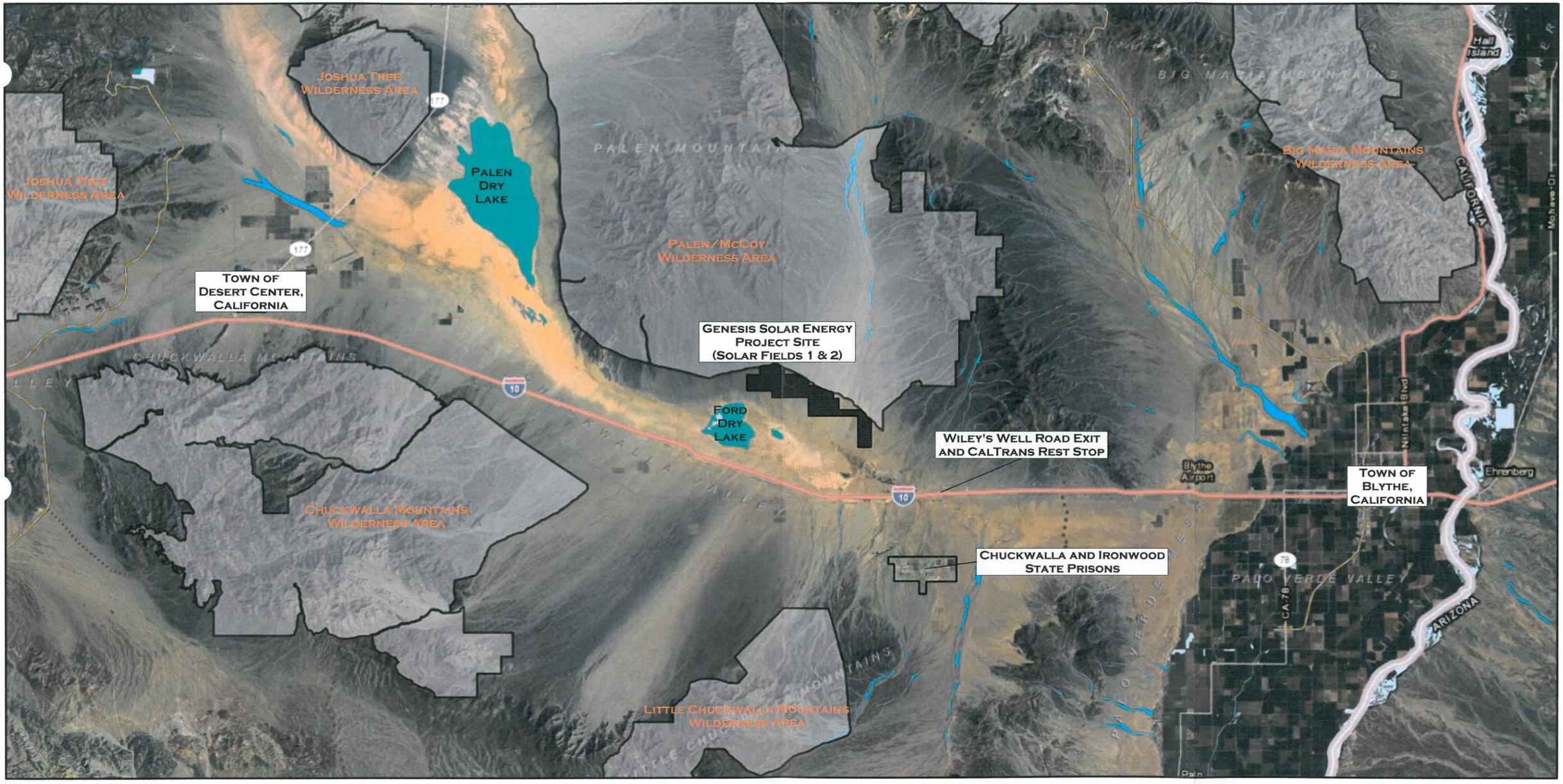
Notes:

amsl = above mean sea level

TOC = top of casing

1. Wells within the Groundwater Monitoring Program were surveyed on February 8 & 9, 2011. Top of Casing elevation for all other wells in this table are approximate and estimated from topographic maps.
2. Measured as feet below top of casing
3. No data was collected due to equipment or software malfunction
4. Sounding tube is blocked with concrete
5. Well not accessible - Unknown lock on well
6. Well not accessible - Steel plate welded over well
7. Due to loss of configuration file and calibration data following the 1st Quarter 2014 monitoring event, the OBS-2 buried transducers are no longer accessible.

FIGURES



Source: ESRI, DigitalGlobe, GeoEye, USDA, USGS. All locations are approximate.

Legend

- Project Site
- Wilderness Area

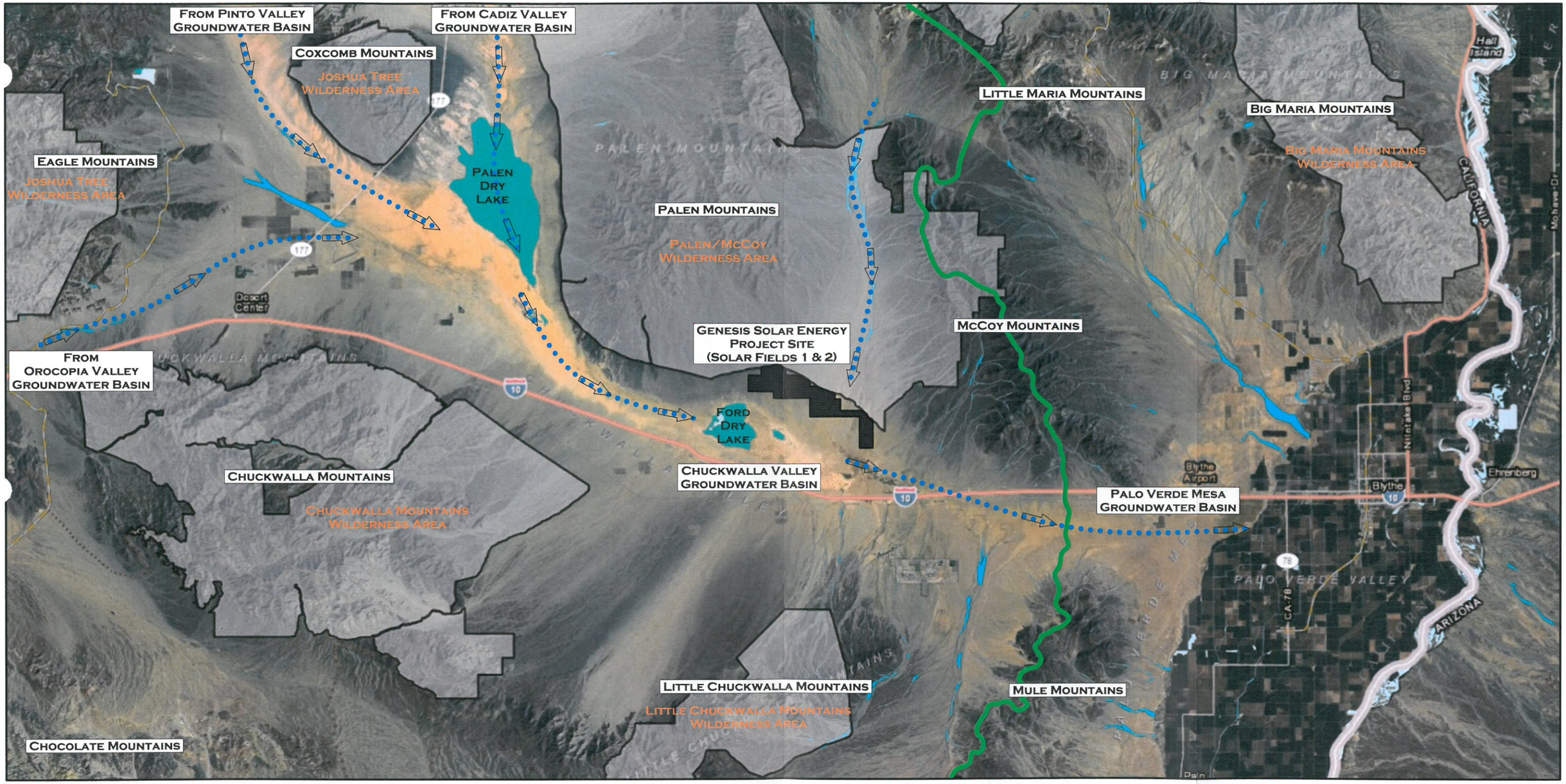
0 1 2 3 4 8 12

Approximate Scale:
1 Inch = 4 Miles

N

637

Phone: 949.580.2800	Project Name: Genesis Solar Energy Project	Project Number: 196-004-01
	Project Address: 11995 Wiley's Well Rd, Blythe, CA	Drawn/Checked By: AWB/CGK
	Engineering Firm: Northstar Environmental Remediation	Date: 12/19/2014
	Address of Firm: 26225 Enterprise Ct, Lake Forest, CA	Version Number: Version 01
	Figure Title: Project Location	Figure Number: Figure 1



Source: ESRI, DigitalGlobe, GeoEye, USDA, USGS; Hydrogeologic Flow Adapted From Steinemann, 1989. All locations are approximate.

Legend

- Project Site
- Wilderness Area
- Chuckwalla Valley Groundwater Basin Eastern Boundary
- Hydrogeologic Water Flow Direction

0 1 2 3 4 8 12

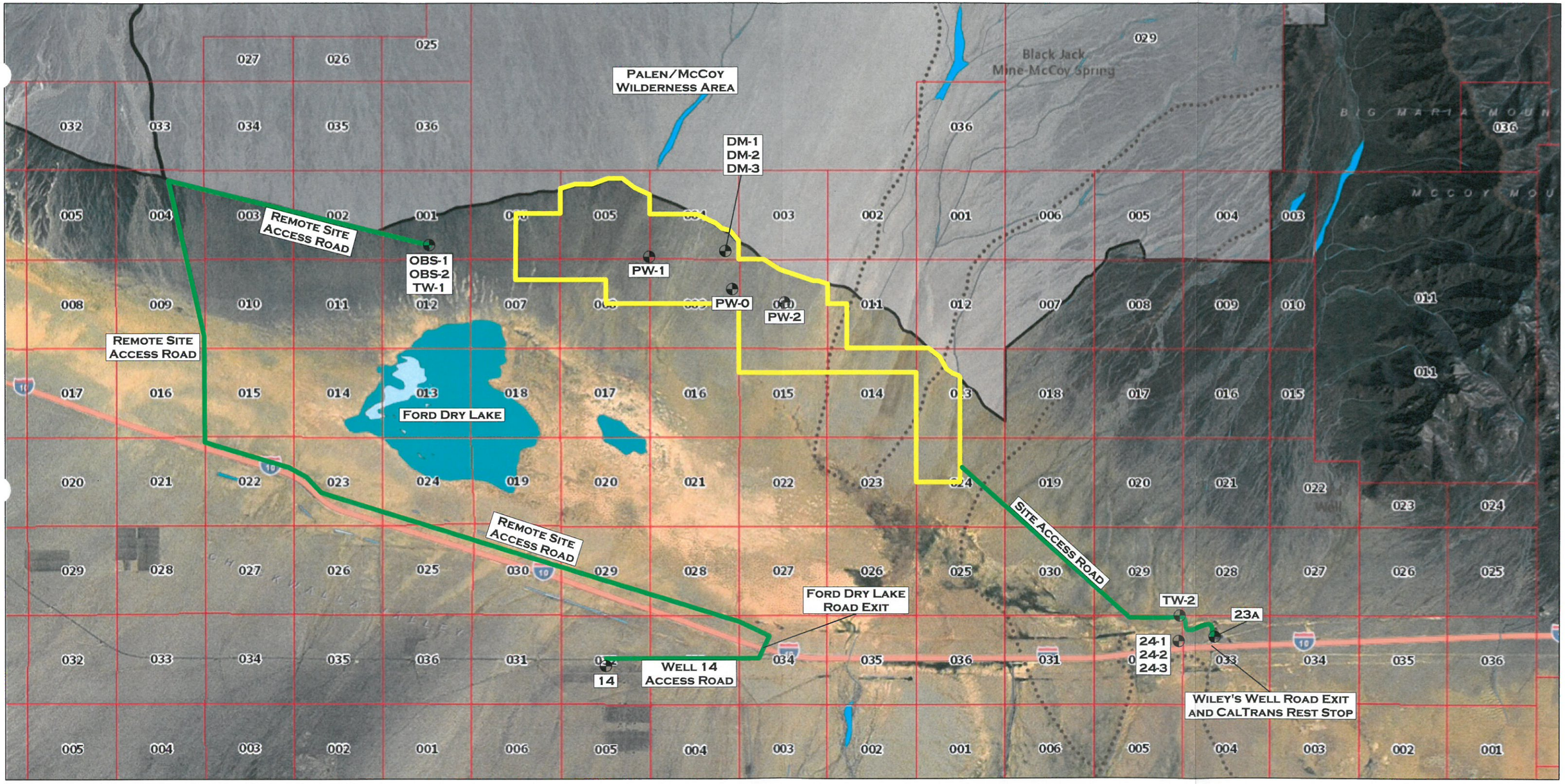
Approximate Scale:
1 Inch = 4 Miles

N

NORTHSTAR ENVIRONMENTAL REMEDIATION

Phone: 949.580.2800

Project Name: Genesis Solar Energy Project	Project Number: 196-004-01
Project Address: 11995 Wiley's Well Rd, Blythe, CA	Drawn/Checked By: AWB/CGK
Engineering Firm: Northstar Environmental Remediation	Date: 12/19/2014
Address of Firm: 26225 Enterprise Ct, Lake Forest, CA	Version Number: Version 01
Figure Title: Hydrogeologic Setting	Figure Number: Figure 2



Source: ESRI, DigitalGlobe, GeoEye, USDA, USGS. All locations are approximate.

Legend

- Active Monitoring Well
- Project Site Boundary
- Access Roads
- Wilderness Area
- Drainage Divide

0 1 2 3

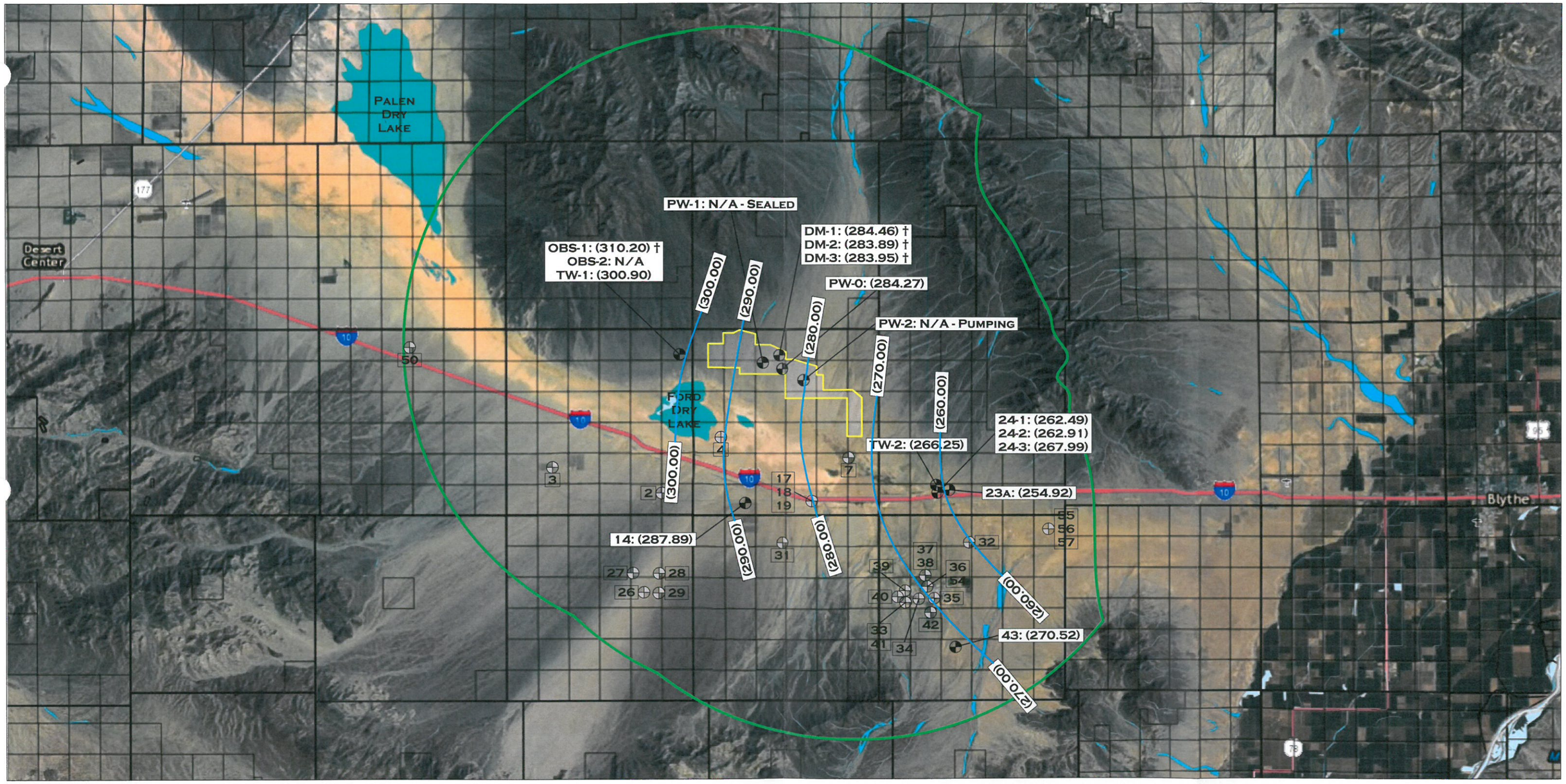
Approximate Scale:
1 Inch = 1 Mile

N

NORTHSTAR ENVIRONMENTAL REMEDIATION

Phone: 949.580.2800

Project Name: Genesis Solar Energy Project	Project Number: 196-004-01
Project Address: 11995 Wiley's Well Rd, Blythe, CA	Drawn/Checked By: AWB/CGK
Engineering Firm: Northstar Environmental Remediation	Date: 12/19/2014
Address of Firm: 26225 Enterprise Ct, Lake Forest, CA	Version Number: Version 01
Figure Title: Groundwater Monitoring Area and Well Locations	Figure Number: Figure 3



SOURCE: ESRI, DIGITALGLOBE, GEOEYE, USDA, USGS. ALL LOCATIONS ARE APPROXIMATE.

LEGEND

- ACTIVE MONITORING WELL
- INACTIVE MONITORING WELL
- GENESIS SOLAR ENERGY PROJECT BOUNDARY
- 10 MILE GROUNDWATER BASIN SITE BUFFER
- GROUNDWATER ELEVATION CONTOUR
- (300.00) GROUNDWATER ELEVATION (FT AMSL)
- † GROUNDWATER ELEVATION IS IN ALLUVIUM AQUIFER AND NOT USED FOR CONTOURING

0 3.2 6.4 9.6

APPROXIMATE SCALE:
1 INCH = 3.2 MILES

N

NORTHSTAR ENVIRONMENTAL REMEDIATION

PHONE 949.580.2800

PROJECT NAME: GENESIS SOLAR ENERGY PROJECT	PROJECT NUMBER: 196-004-01
PROJECT ADDRESS: 11995 WILEY'S WELL RD, BLYTHE, CA	DRAWN/CHECKED BY: AWB/CGK
ENGINEERING FIRM: NORTHSTAR ENVIRONMENTAL REMEDIATION	DATE: 12/19/2014
ADDRESS OF FIRM: 26225 ENTERPRISE CT, LAKE FOREST, CA	VERSION NUMBER: VERSION 01
FIGURE TITLE: 4TH QUARTER 2014 BOUSE FORMATION GROUNDWATER ELEVATION CONTOUR MAP	FIGURE NUMBER: FIGURE 4

APPENDIX A
FIELD DATA SHEETS

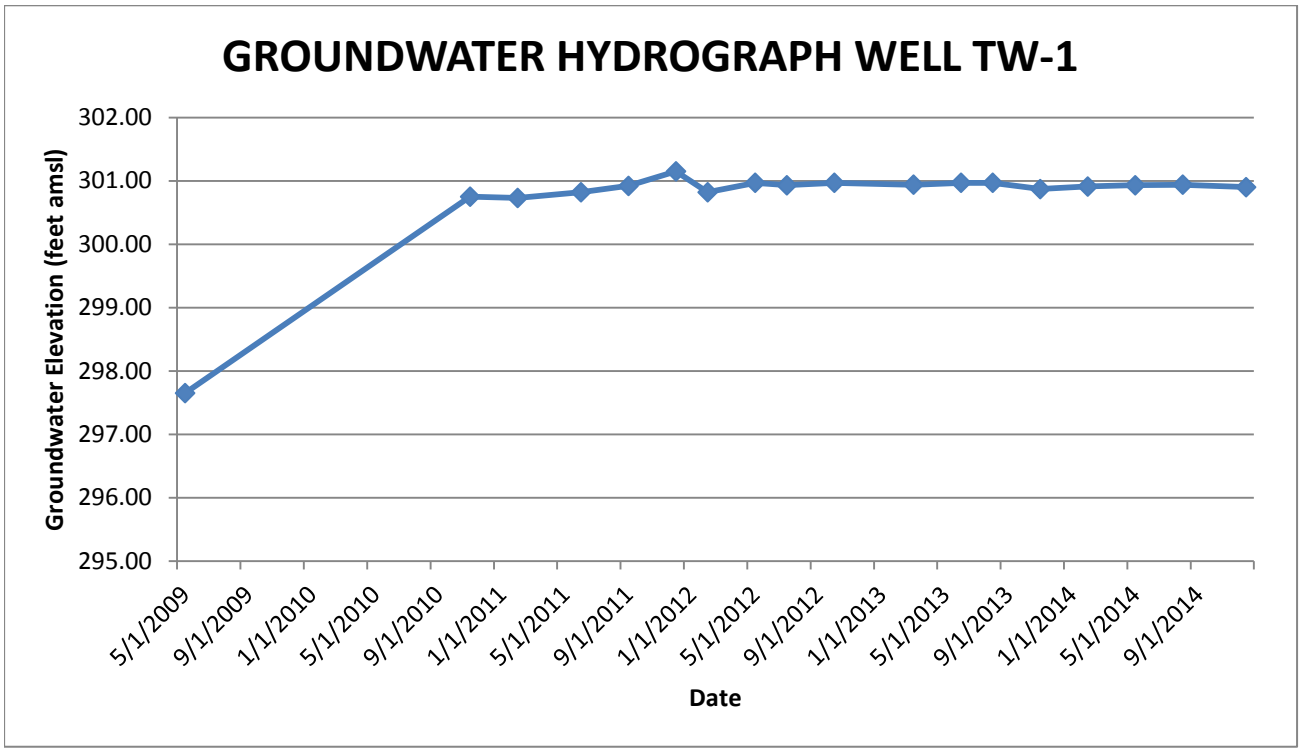
GROUNDWATER LEVEL MEASUREMENT FORM

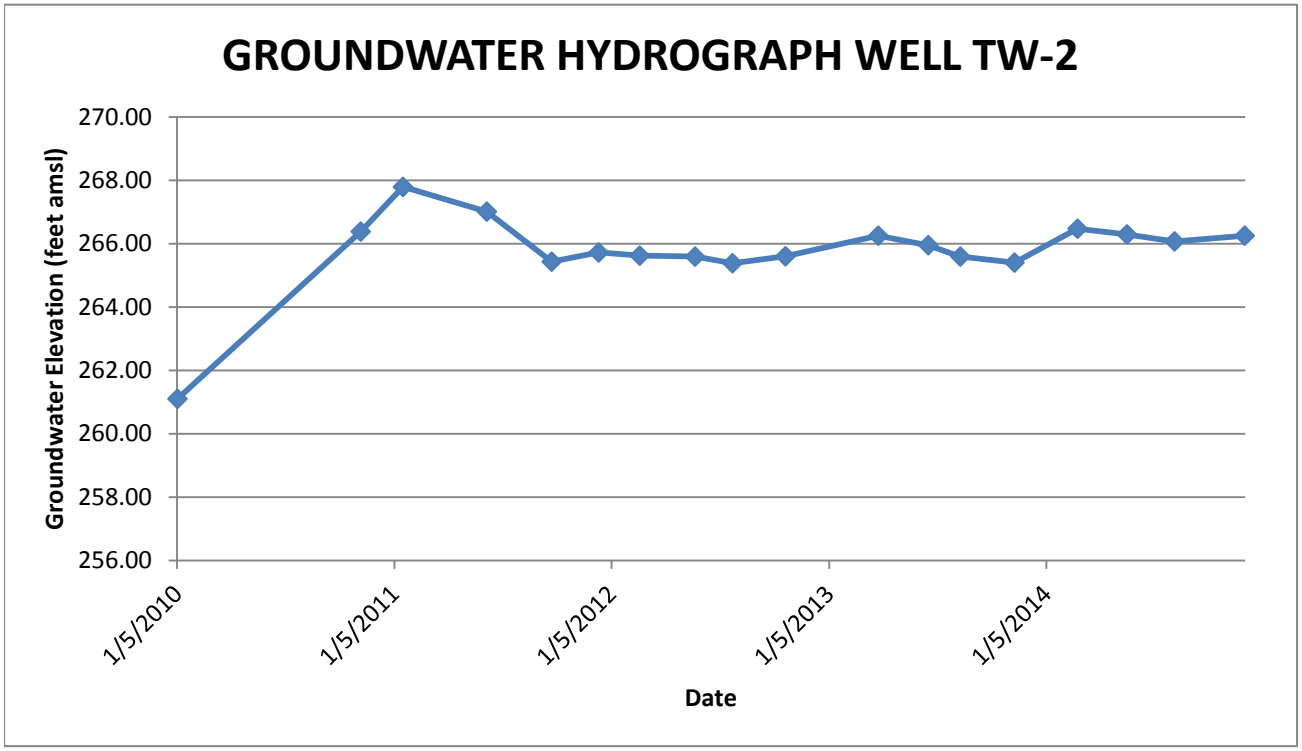
Quarter: 4th Quarter 2014	Site: GENESIS SOLAR ENERGY PROJECT	Project No: 196-004-01
Project: GROUNDWATER LEVEL MONITORING PROGRAM		PM: AWB
Measurement Method/Device: Solinst Interface Probe		Technicians: RCD/AWB
Weather: Cloudy, Warm		

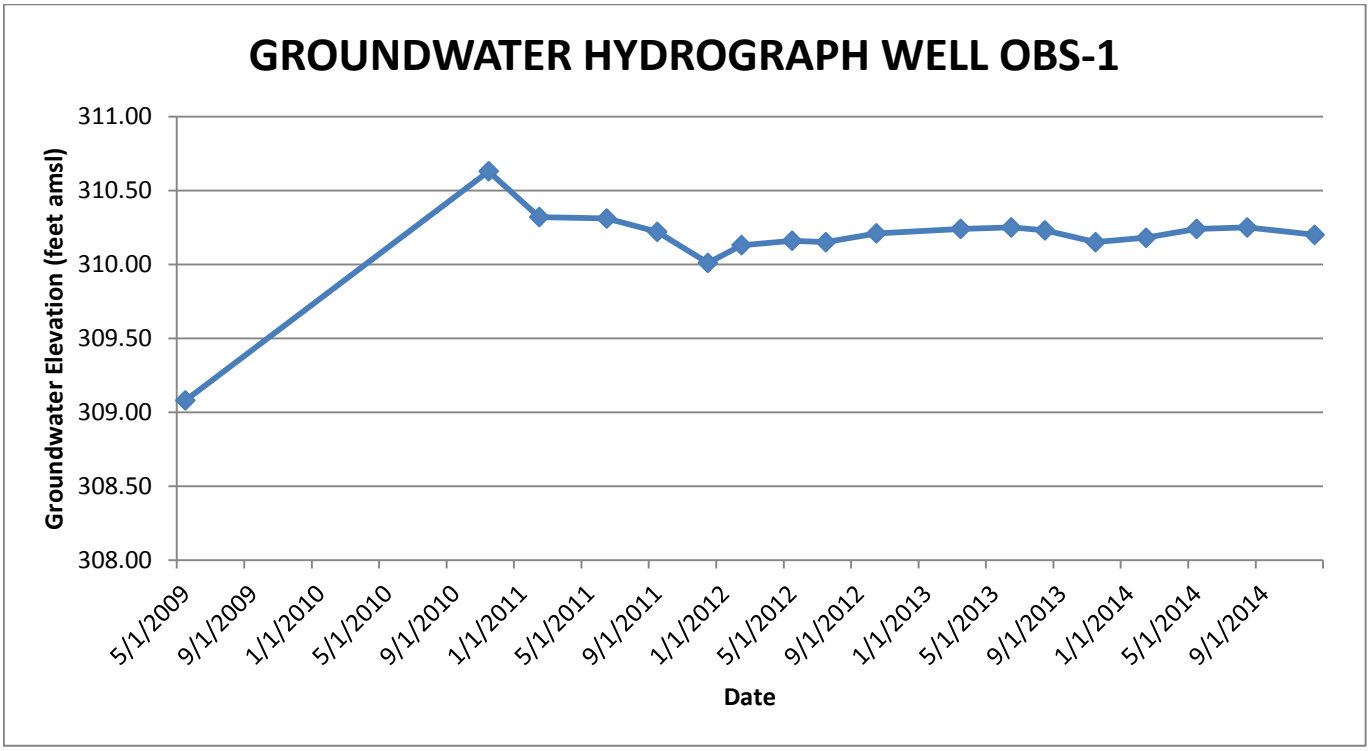
Well No.	Date	TOC Reference Elevation (ft)	Depth to Water (ft)	Corrected Water Level Elevation (ft)	Comments
TW-1	12/04/14	387.40	86.50	300.90	Solinst Levelogger Transducer
TW-2	12/04/14	393.47	127.22	266.25	Manual Measurement
OBS-1	12/04/14	388.30	78.10	310.20	Solinst Levelogger Transducer
OBS-2-270	—	388.14	—	—	Buried Transducer Cable
OBS-2-315	—	388.14	—	—	Buried Transducer Cable
OBS-2-370	—	388.14	—	—	Buried Transducer Cable
OBS-2-400	—	388.14	—	—	Buried Transducer Cable
14	12/04/14	388.14	100.25	287.89	Manual Measurement
23a	12/04/14	392.10	137.18	254.92	Manual Measurement
24-1	12/05/14	389.40	126.91	262.49	Manual Measurement
24-2	12/05/14	388.86	125.95	262.91	Manual Measurement
24-3	12/05/14	392.04	124.05	267.99	Manual Measurement
PW-0	12/04/14	383.92	99.65	284.27	Manual Measurement
PW-1	—	384.10	—	—	Manual Measurement
PW-2	—	384.10	—	—	Manual Measurement
DM-1	12/04/14	391.49	107.03	284.46	Manual Measurement
DM-2	12/04/14	391.32	107.43	283.89	Manual Measurement
DM-3	12/04/14	388.34	104.39	283.95	Manual Measurement

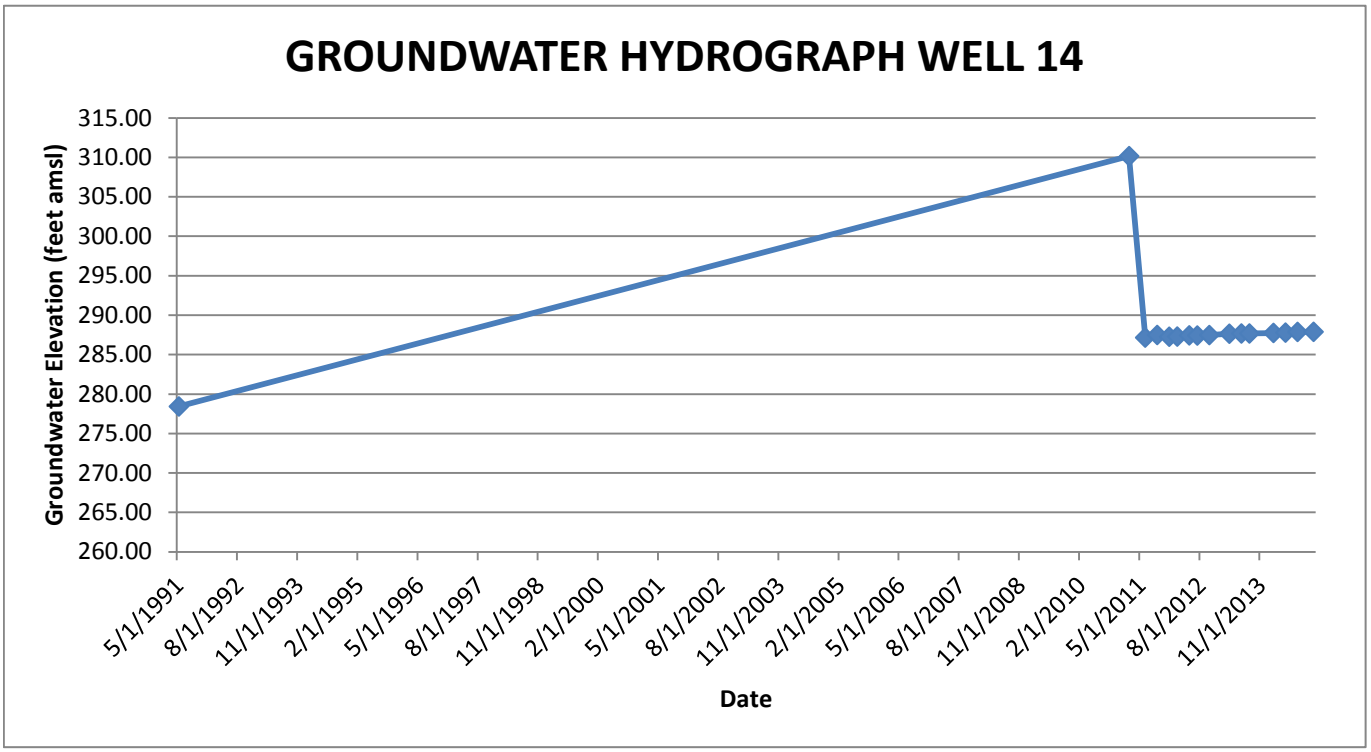
Additional Notes: OBS-2 transducers inaccessible (programming issue).
PW-1 inaccessible (cap welded over well).
PW-2 inaccessible (pump is online).

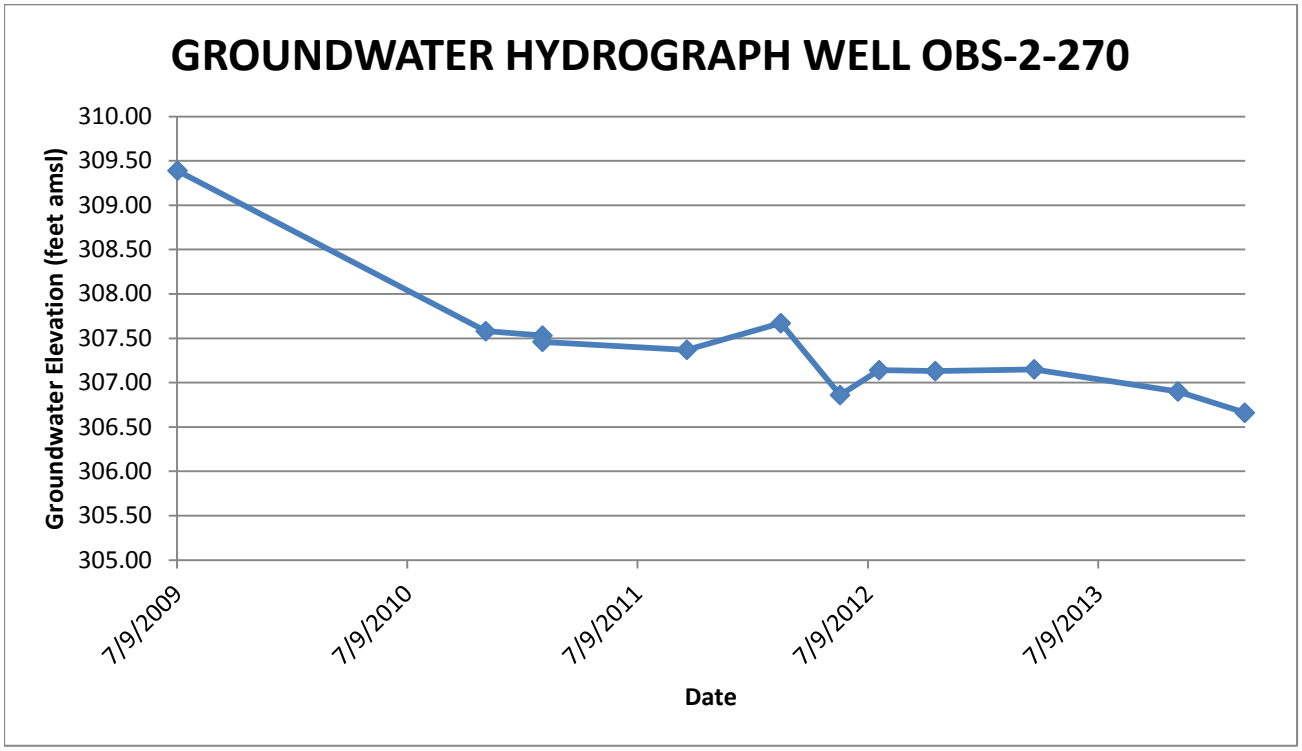
APPENDIX B
HYDROGRAPHS

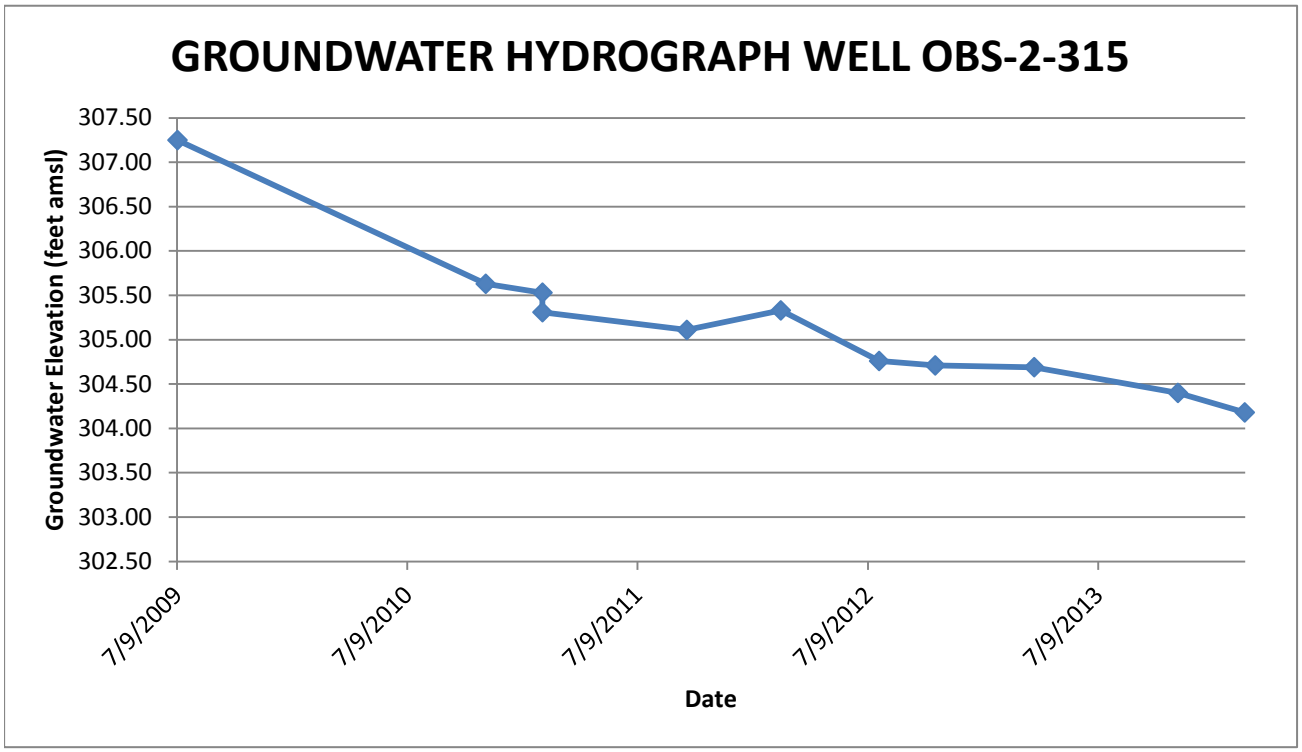

GROUNDWATER HYDROGRAPH WELL TW-1
Groundwater Elevation (feet amsl)
302.00
301.00
300.00
299.00
298.00
297.00
296.00
295.00
5/1/2009
9/1/2009
1/1/2010
5/1/2010
9/1/2010
1/1/2011
5/1/2011
9/1/2011
1/1/2012
5/1/2012
9/1/2012
1/1/2013
5/1/2013
9/1/2013
1/1/2014
5/1/2014
9/1/2014
Date

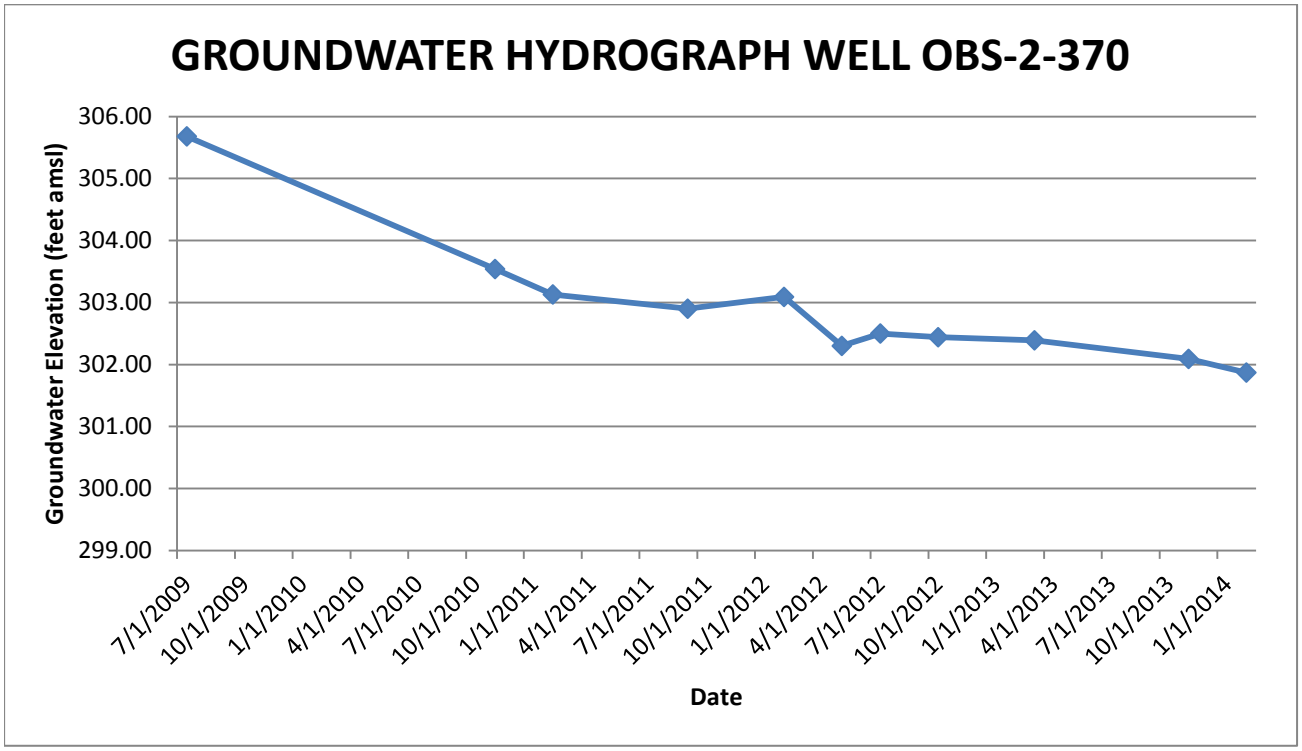

GROUNDWATER HYDROGRAPH WELL TW-2
Groundwater Elevation (feet amsl)
270.00
268.00
266.00
264.00
262.00
260.00
258.00
256.00
1/5/2010
1/5/2011
1/5/2012
1/5/2013
1/5/2014
Date

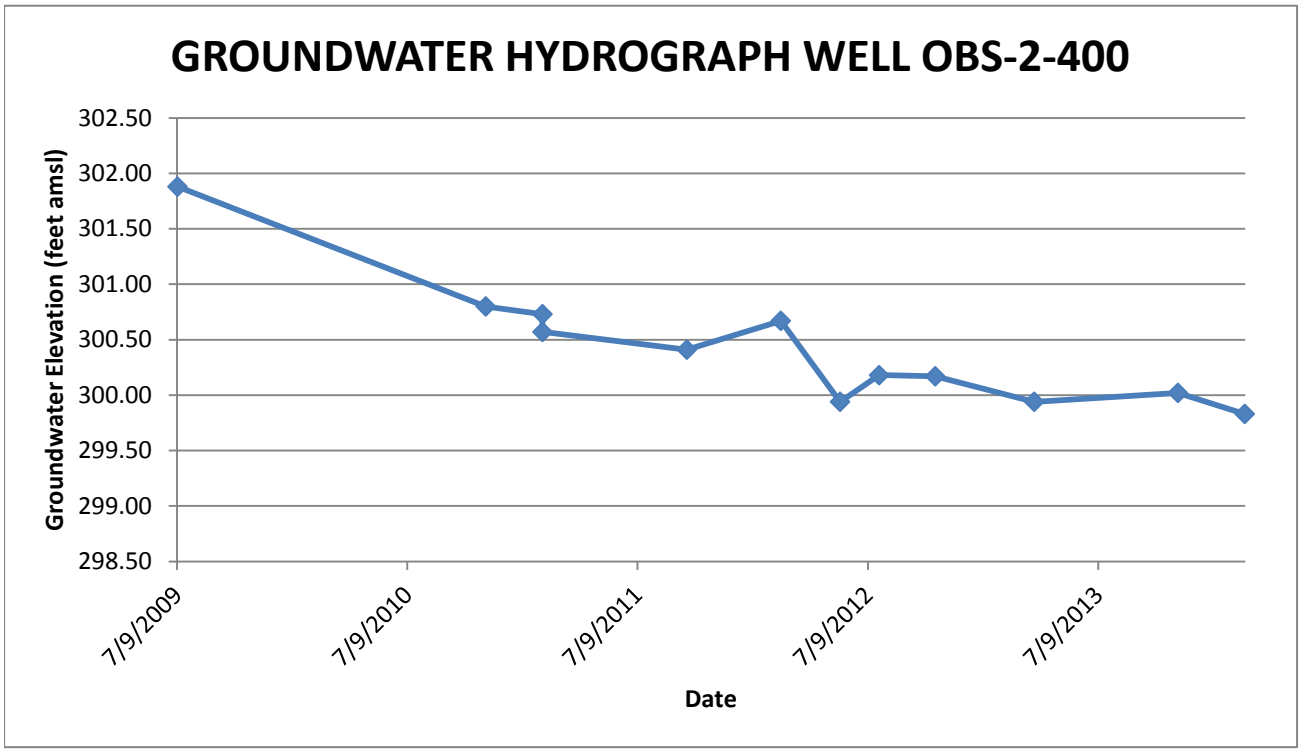

GROUNDWATER HYDROGRAPH WELL OBS-1
Groundwater Elevation (feet amsl)
311.00
310.50
310.00
309.50
309.00
308.50
308.00
5/1/2009
9/1/2009
1/1/2010
5/1/2010
9/1/2010
1/1/2011
5/1/2011
9/1/2011
1/1/2012
5/1/2012
9/1/2012
1/1/2013
5/1/2013
9/1/2013
1/1/2014
5/1/2014
9/1/2014
Date

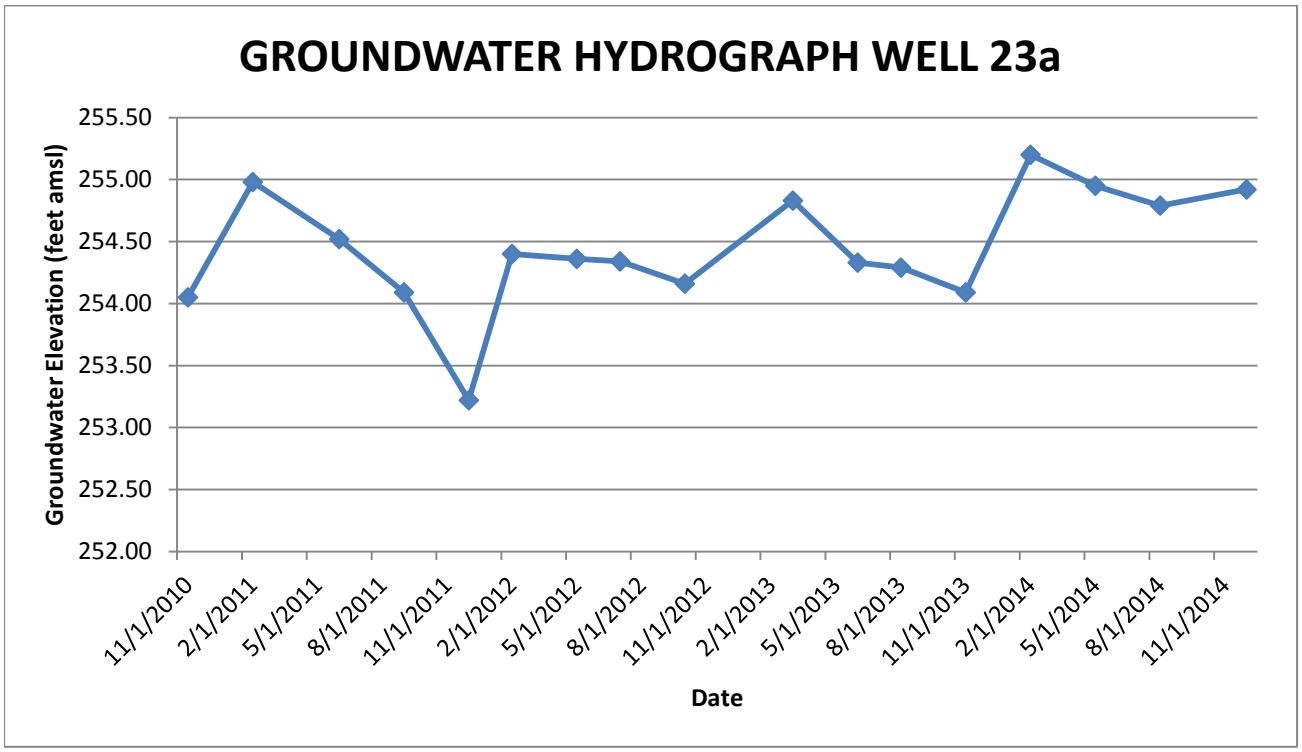

GROUNDWATER HYDROGRAPH WELL 14
Groundwater Elevation (feet amsl)
315.00
310.00
305.00
300.00
295.00
290.00
285.00
280.00
275.00
270.00
265.00
260.00
5/1/1991
8/1/1992
11/1/1993
2/1/1995
5/1/1996
8/1/1997
11/1/1998
2/1/2000
5/1/2001
8/1/2002
11/1/2003
2/1/2005
5/1/2006
8/1/2007
11/1/2008
2/1/2010
5/1/2011
8/1/2012
11/1/2013
Date

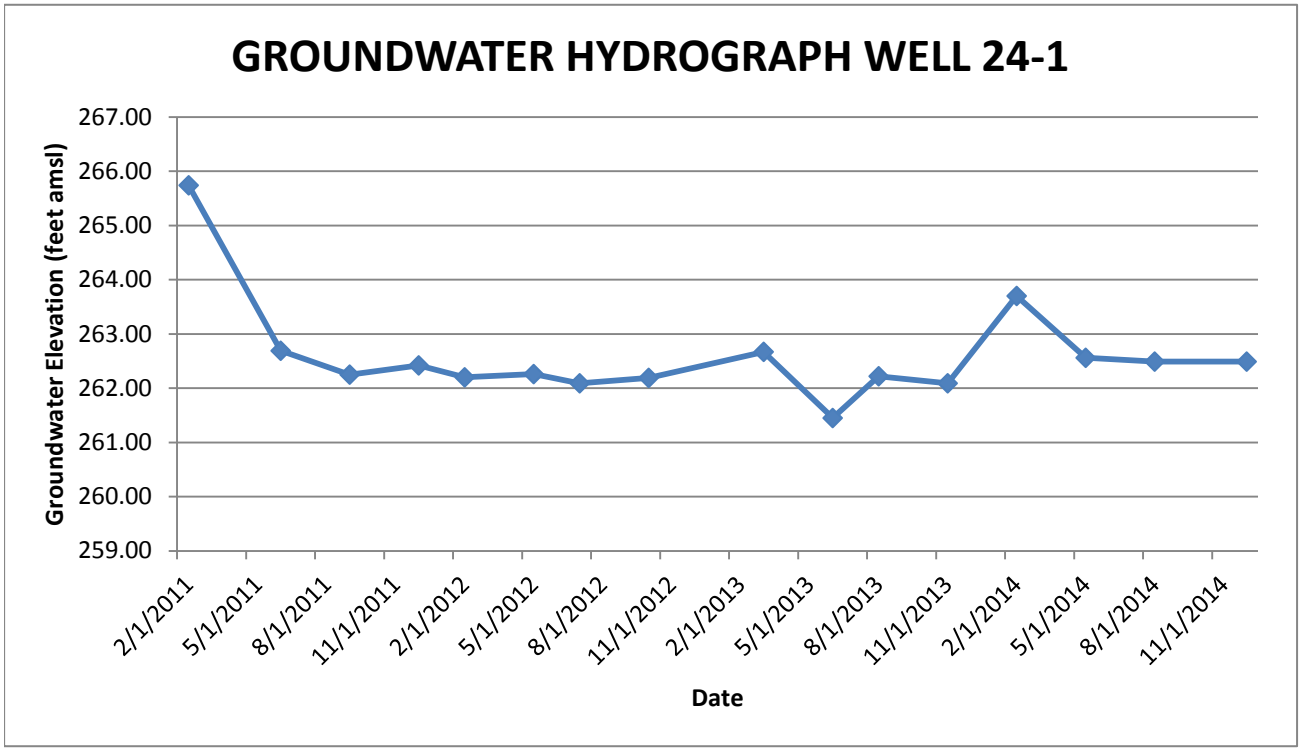

GROUNDWATER HYDROGRAPH WELL OBS-2-270
Groundwater Elevation (feet amsl)
310.00
309.50
309.00
308.50
308.00
307.50
307.00
306.50
306.00
305.50
305.00
7/9/2009
7/9/2010
7/9/2011
7/9/2012
7/9/2013
Date

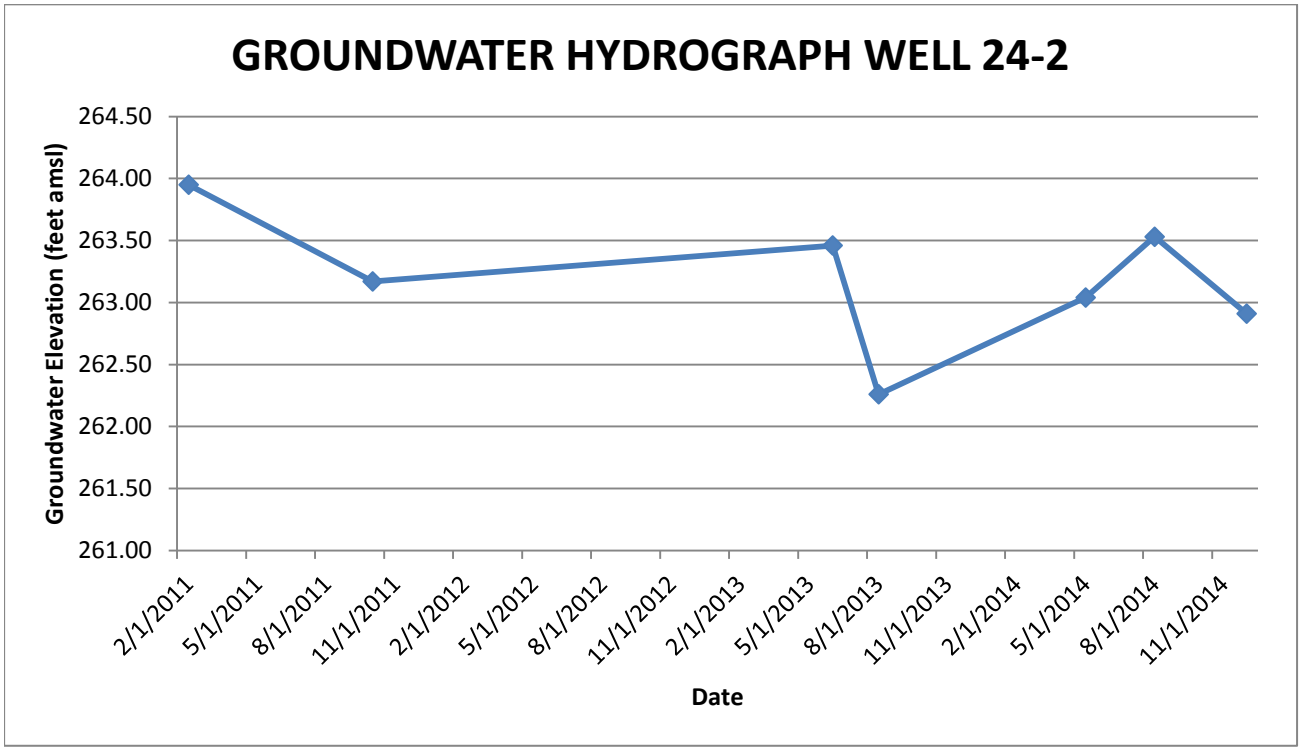

GROUNDWATER HYDROGRAPH WELL OBS-2-315
Groundwater Elevation (feet amsl)
307.50
307.00
306.50
306.00
305.50
305.00
304.50
304.00
303.50
303.00
302.50
7/9/2009
7/9/2010
7/9/2011
7/9/2012
7/9/2013
Date

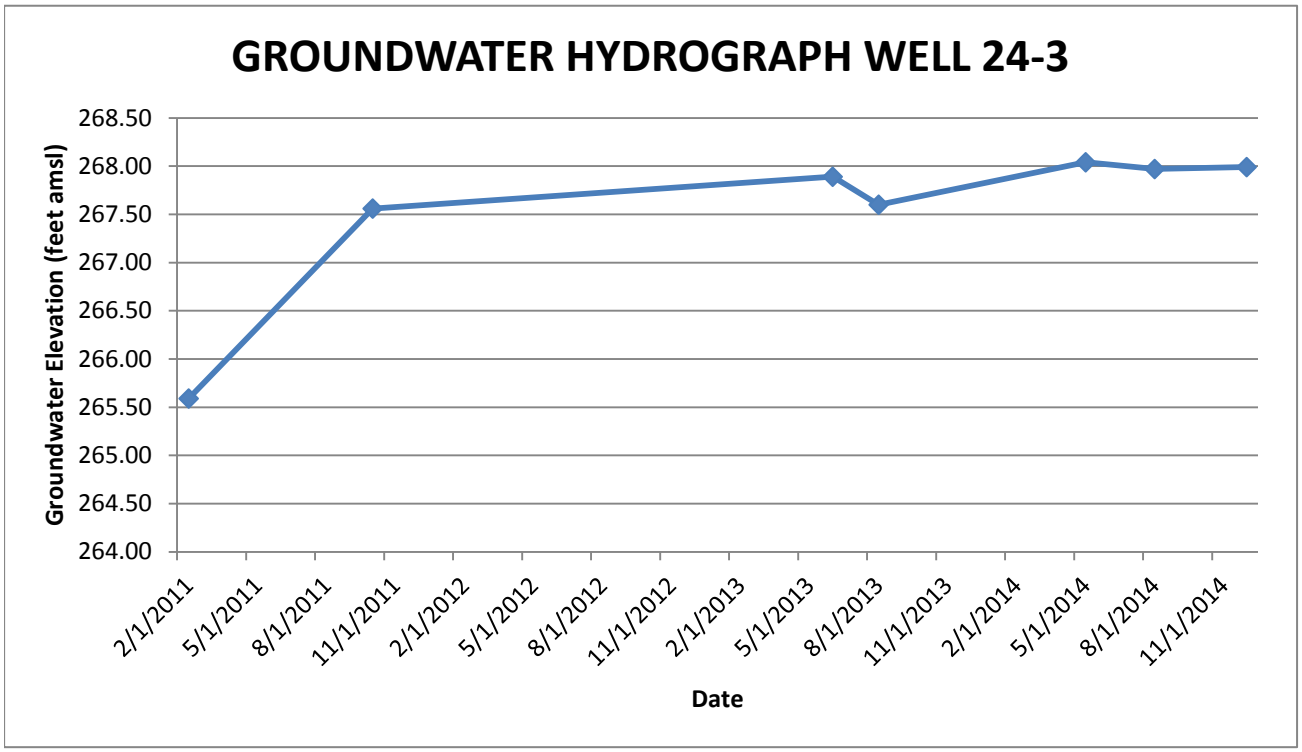

GROUNDWATER HYDROGRAPH WELL OBS-2-370
Groundwater Elevation (feet amsl)
306.00
305.00
304.00
303.00
302.00
301.00
300.00
299.00
7/1/2009
10/1/2009
1/1/2010
4/1/2010
7/1/2010
10/1/2010
1/1/2011
4/1/2011
7/1/2011
10/1/2011
1/1/2012
4/1/2012
7/1/2012
10/1/2012
1/1/2013
4/1/2013
7/1/2013
10/1/2013
1/1/2014
Date

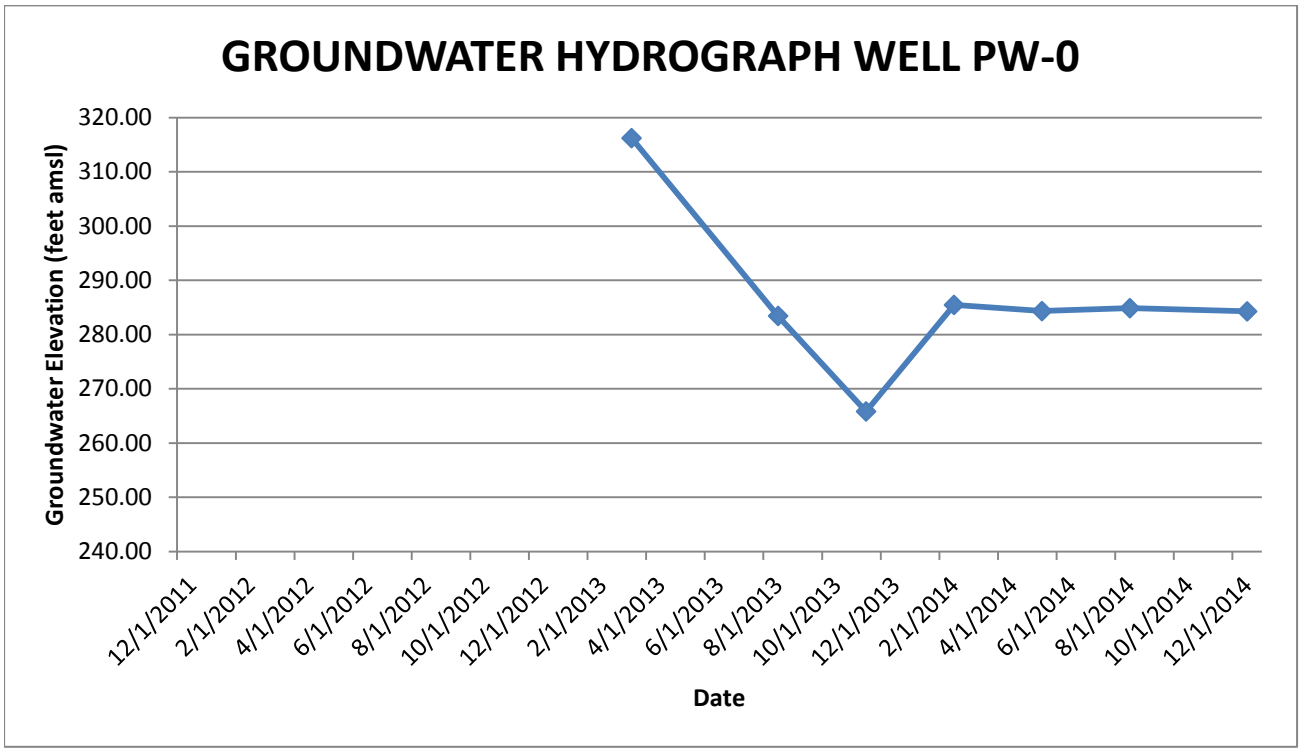

GROUNDWATER HYDROGRAPH WELL OBS-2-400
Groundwater Elevation (feet amsl)
302.50
302.00
301.50
301.00
300.50
300.00
299.50
299.00
298.50
7/9/2009
7/9/2010
7/9/2011
7/9/2012
7/9/2013
Date

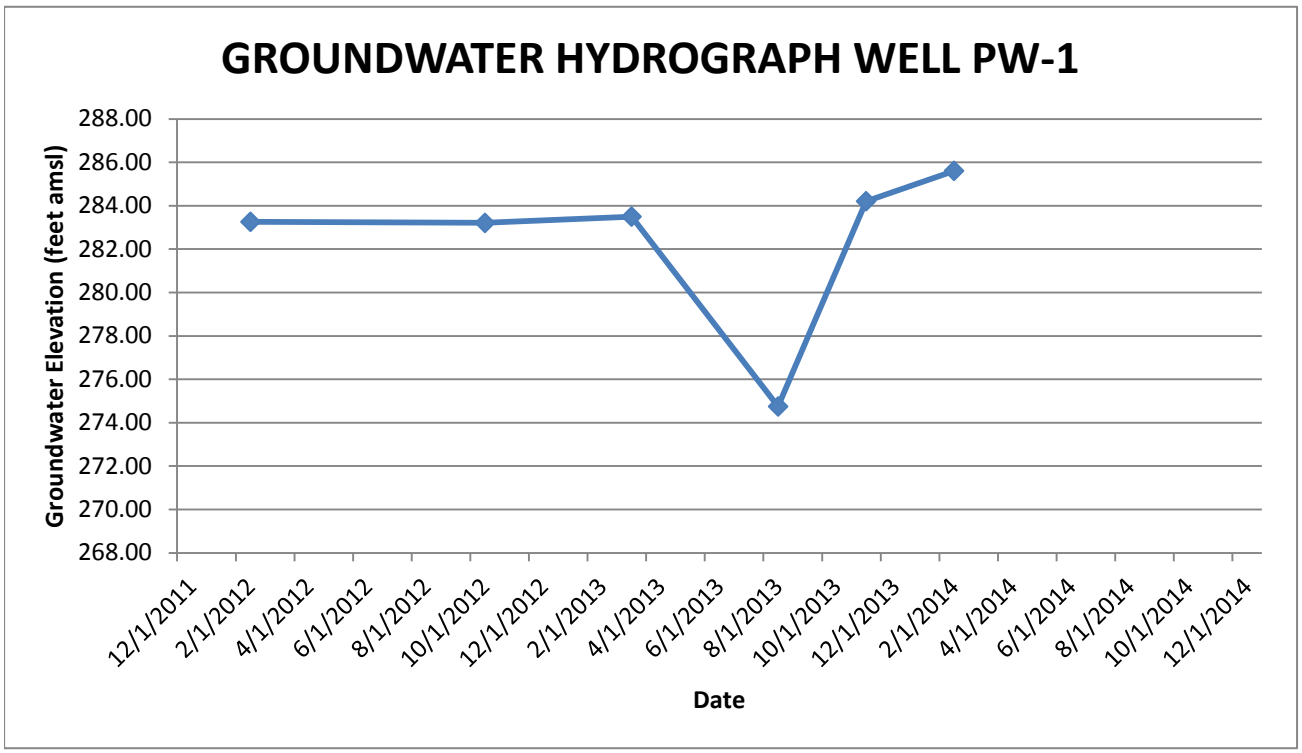

GROUNDWATER HYDROGRAPH WELL 23a
Groundwater Elevation (feet amsl)
255.50
255.00
254.50
254.00
253.50
253.00
252.50
252.00
11/1/2010
2/1/2011
5/1/2011
8/1/2011
11/1/2011
2/1/2012
5/1/2012
8/1/2012
11/1/2012
2/1/2013
5/1/2013
8/1/2013
11/1/2013
2/1/2014
5/1/2014
8/1/2014
11/1/2014
Date

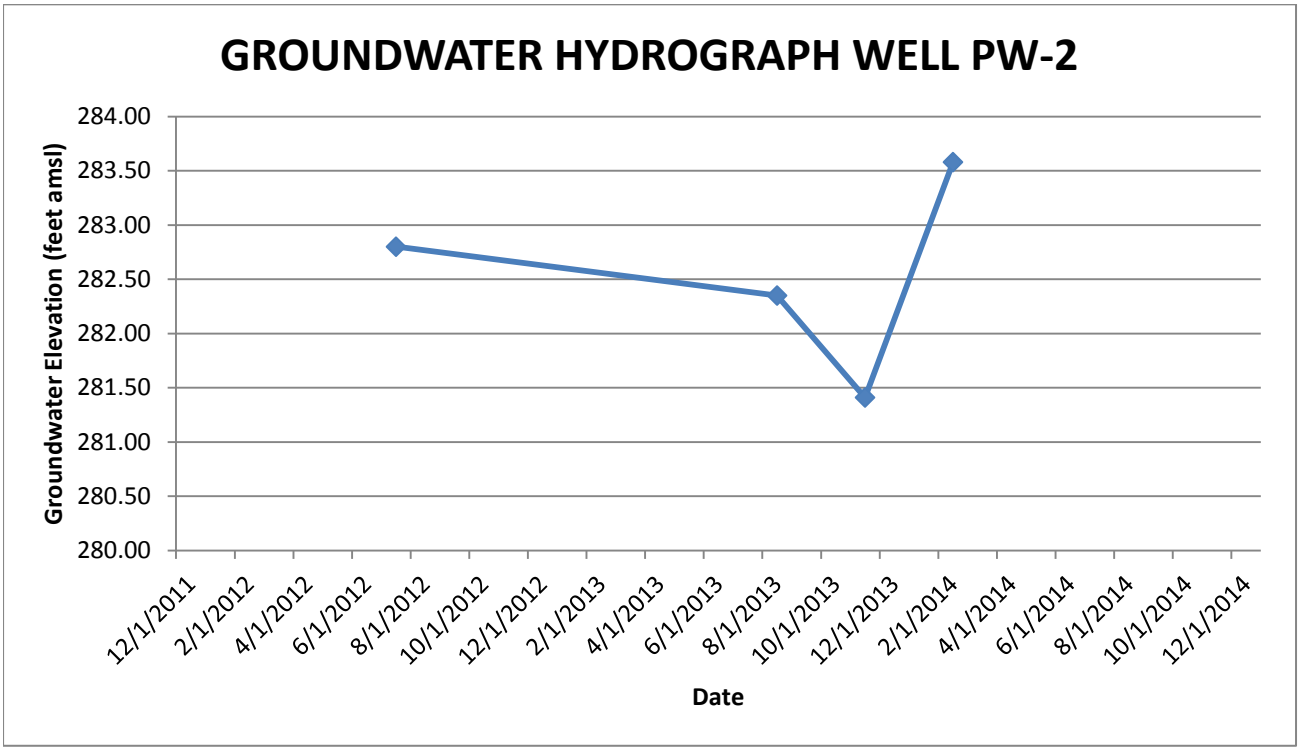

GROUNDWATER HYDROGRAPH WELL 24-1
Groundwater Elevation (feet amsl)
267.00
266.00
265.00
264.00
263.00
262.00
261.00
260.00
259.00
2/1/2011
5/1/2011
8/1/2011
11/1/2011
2/1/2012
5/1/2012
8/1/2012
11/1/2012
2/1/2013
5/1/2013
8/1/2013
11/1/2013
2/1/2014
5/1/2014
8/1/2014
11/1/2014
Date

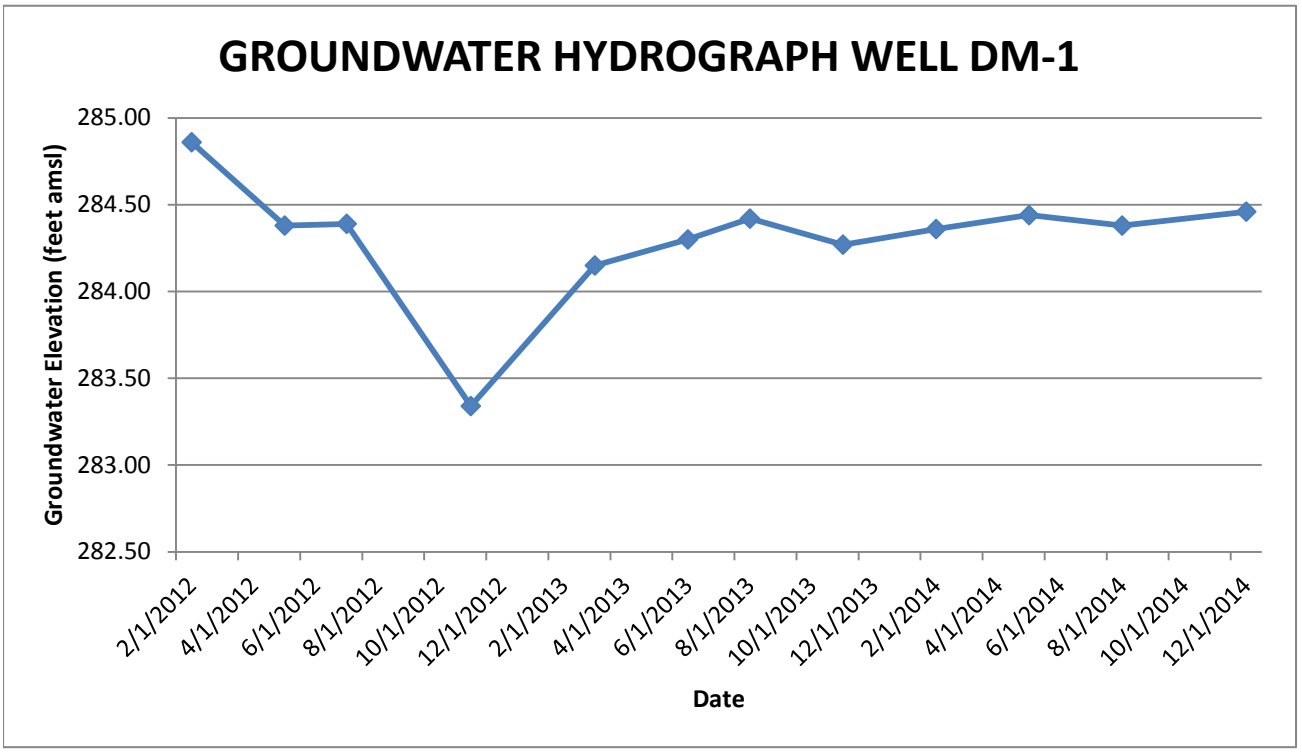

GROUNDWATER HYDROGRAPH WELL 24-2
Groundwater Elevation (feet amsl)
264.50
264.00
263.50
263.00
262.50
262.00
261.50
261.00
2/1/2011
5/1/2011
8/1/2011
11/1/2011
2/1/2012
5/1/2012
8/1/2012
11/1/2012
2/1/2013
5/1/2013
8/1/2013
11/1/2013
2/1/2014
5/1/2014
8/1/2014
11/1/2014
Date

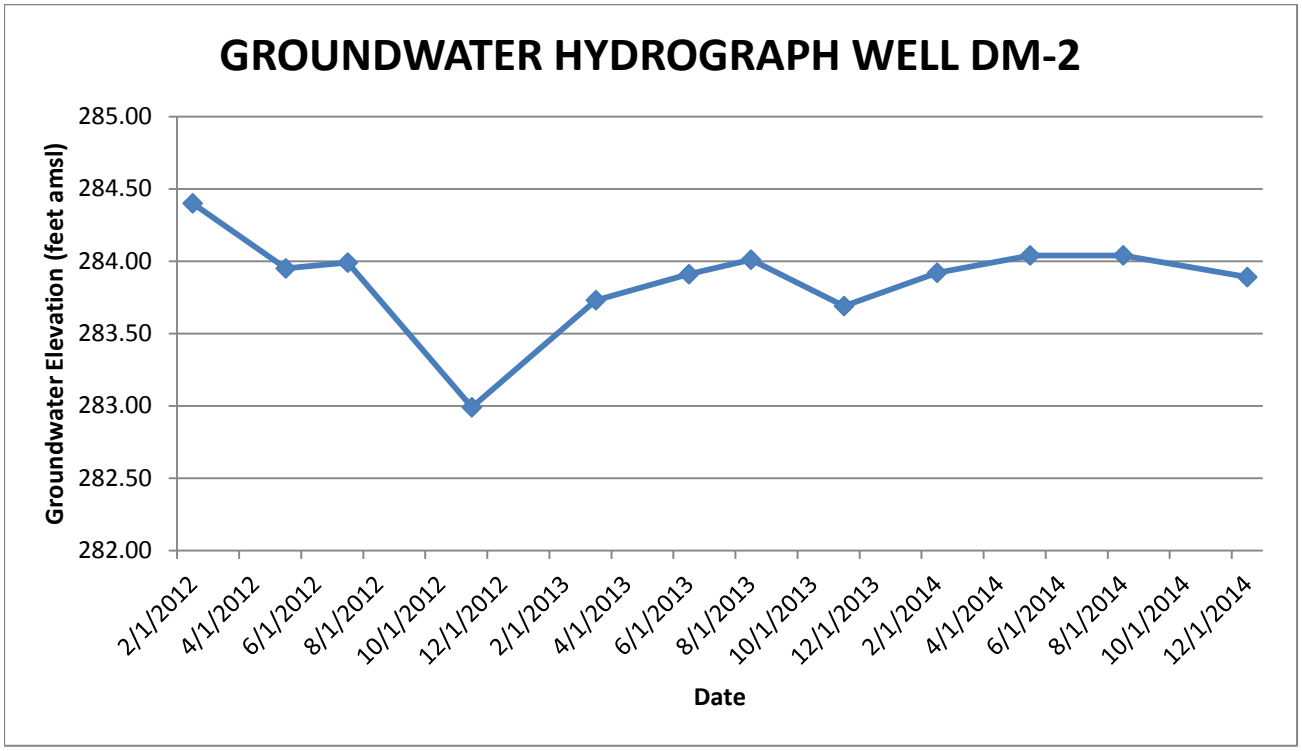

GROUNDWATER HYDROGRAPH WELL 24-3
Groundwater Elevation (feet amsl)
268.50
268.00
267.50
267.00
266.50
266.00
265.50
265.00
264.50
264.00
2/1/2011
5/1/2011
8/1/2011
11/1/2011
2/1/2012
5/1/2012
8/1/2012
11/1/2012
2/1/2013
5/1/2013
8/1/2013
11/1/2013
2/1/2014
5/1/2014
8/1/2014
11/1/2014
Date

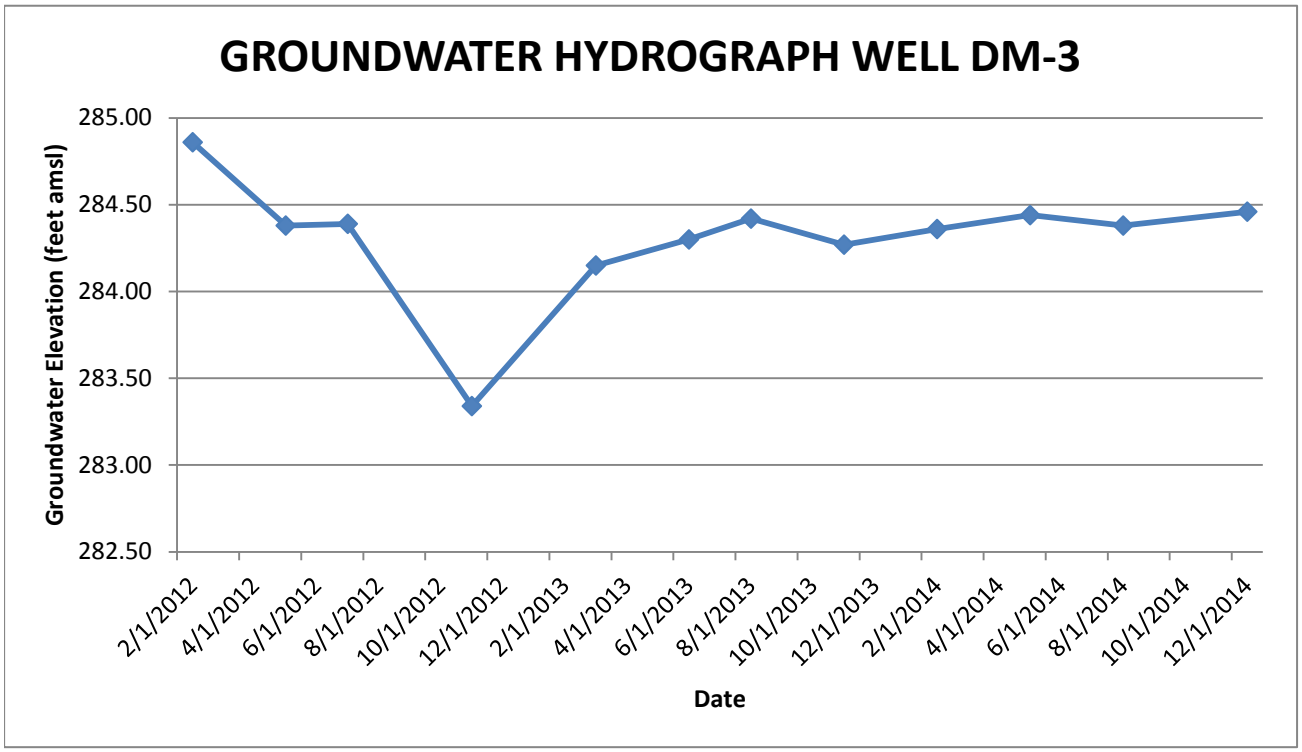

GROUNDWATER HYDROGRAPH WELL PW-0
Groundwater Elevation (feet amsl)
320.00
310.00
300.00
290.00
280.00
270.00
260.00
250.00
240.00
12/1/2011
2/1/2012
4/1/2012
6/1/2012
8/1/2012
10/1/2012
12/1/2012
2/1/2013
4/1/2013
6/1/2013
8/1/2013
10/1/2013
12/1/2013
2/1/2014
4/1/2014
6/1/2014
8/1/2014
10/1/2014
12/1/2014
Date

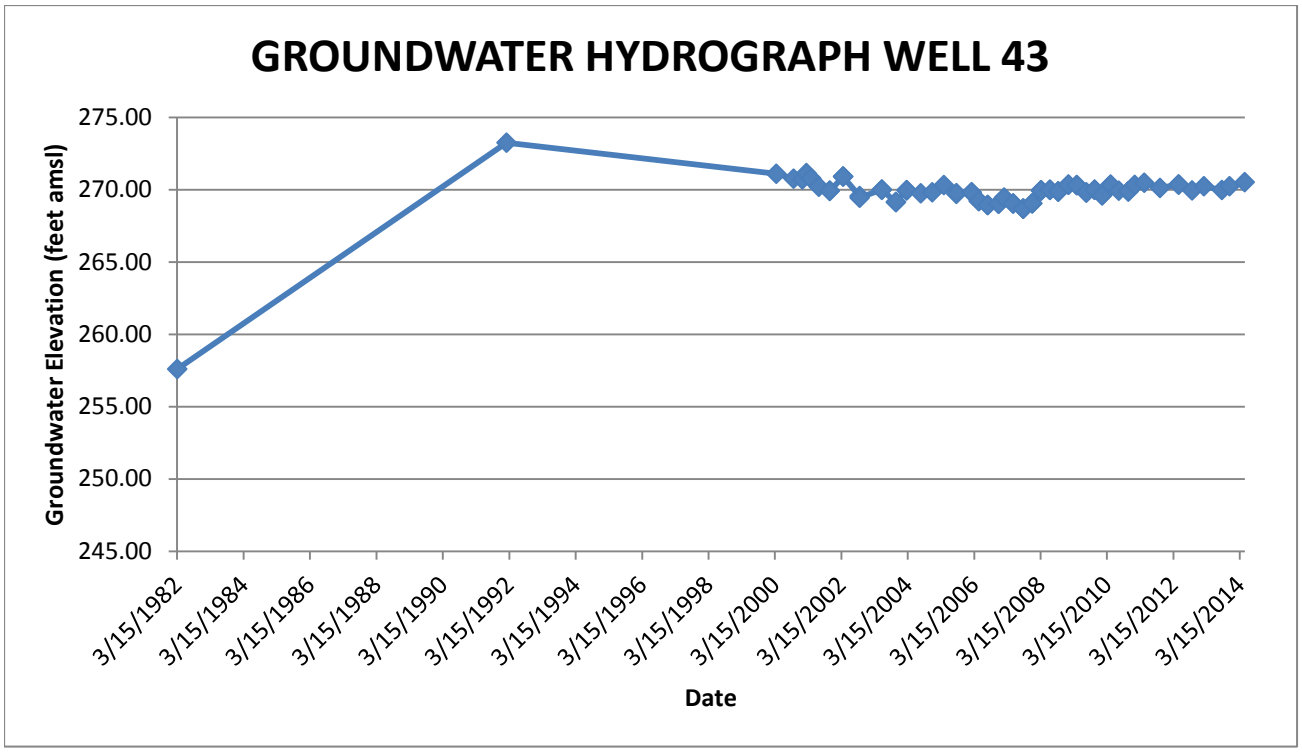

GROUNDWATER HYDROGRAPH WELL PW-1
Groundwater Elevation (feet amsl)
288.00
286.00
284.00
282.00
280.00
278.00
276.00
274.00
272.00
270.00
268.00
12/1/2011
2/1/2012
4/1/2012
6/1/2012
8/1/2012
10/1/2012
12/1/2012
2/1/2013
4/1/2013
6/1/2013
8/1/2013
10/1/2013
12/1/2013
2/1/2014
4/1/2014
6/1/2014
8/1/2014
10/1/2014
12/1/2014
Date

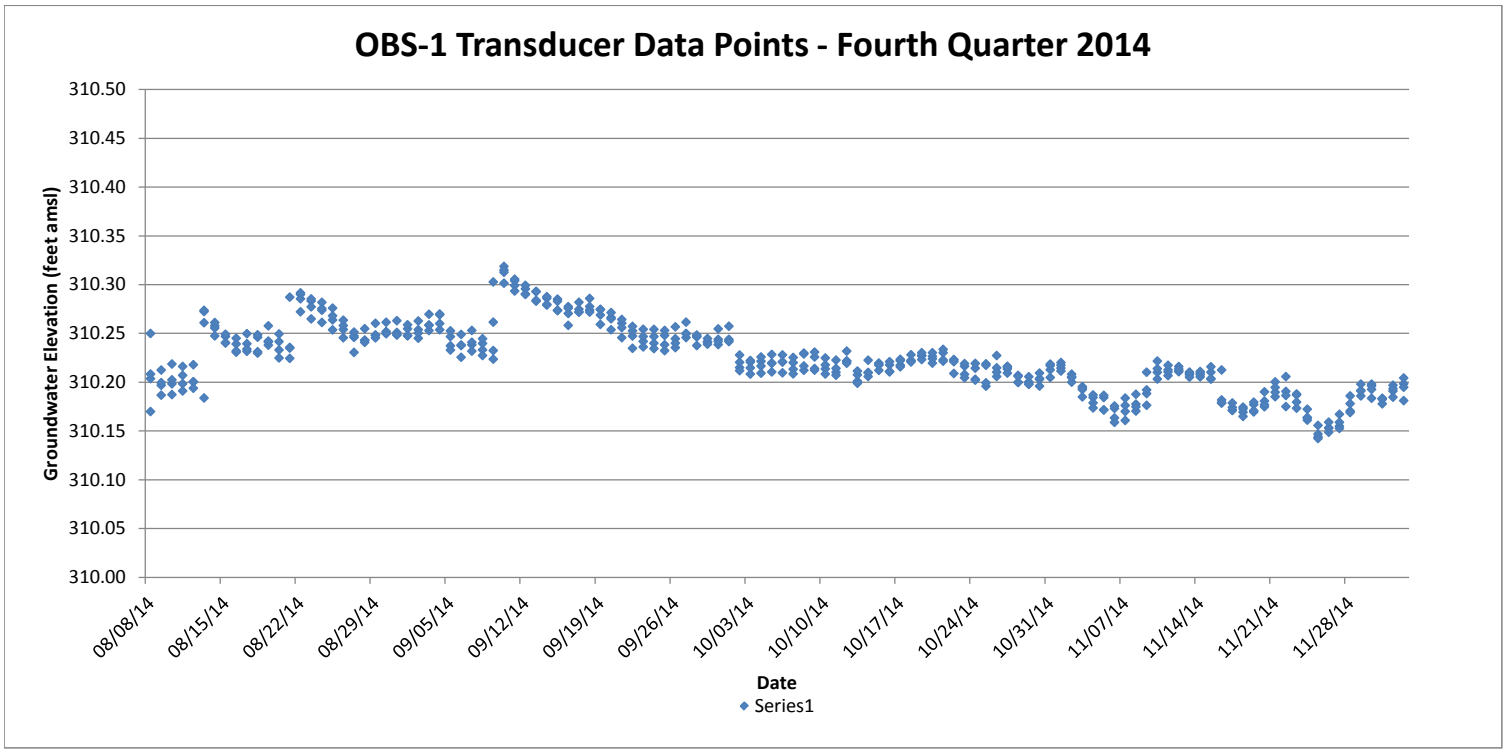

GROUNDWATER HYDROGRAPH WELL PW-2
Groundwater Elevation (feet amsl)
284.00
283.50
283.00
282.50
282.00
281.50
281.00
280.50
280.00
12/1/2011
2/1/2012
4/1/2012
6/1/2012
8/1/2012
10/1/2012
12/1/2012
2/1/2013
4/1/2013
6/1/2013
8/1/2013
10/1/2013
12/1/2013
2/1/2014
4/1/2014
6/1/2014
8/1/2014
10/1/2014
12/1/2014
Date

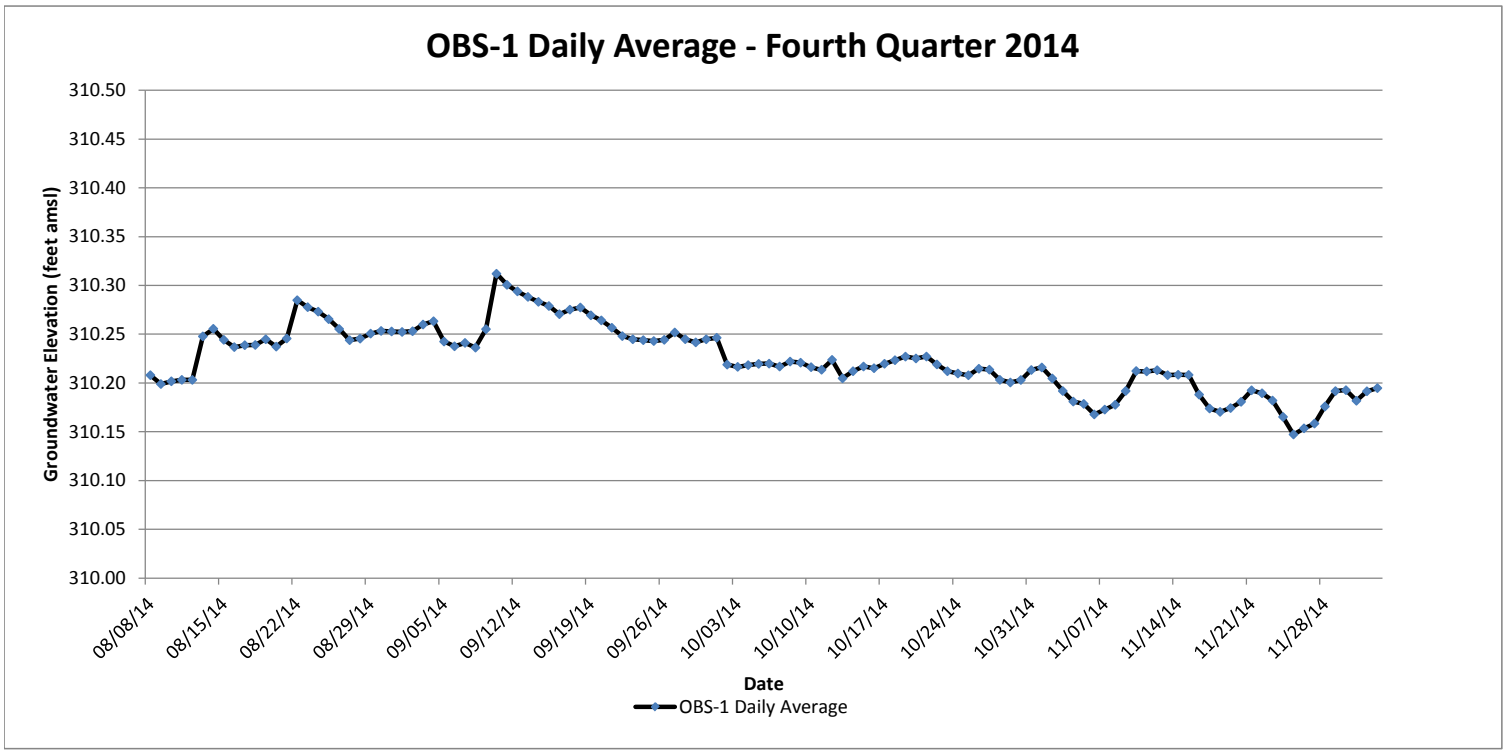

GROUNDWATER HYDROGRAPH WELL DM-1
Groundwater Elevation (feet amsl)
285.00
284.50
284.00
283.50
283.00
282.50
2/1/2012
4/1/2012
6/1/2012
8/1/2012
10/1/2012
12/1/2012
2/1/2013
4/1/2013
6/1/2013
8/1/2013
10/1/2013
12/1/2013
2/1/2014
4/1/2014
6/1/2014
8/1/2014
10/1/2014
12/1/2014
Date


GROUNDWATER HYDROGRAPH WELL DM-2
Groundwater Elevation (feet amsl)
285.00
284.50
284.00
283.50
283.00
282.50
282.00
2/1/2012
4/1/2012
6/1/2012
8/1/2012
10/1/2012
12/1/2012
2/1/2013
4/1/2013
6/1/2013
8/1/2013
10/1/2013
12/1/2013
2/1/2014
4/1/2014
6/1/2014
8/1/2014
10/1/2014
12/1/2014
Date


GROUNDWATER HYDROGRAPH WELL DM-3
Groundwater Elevation (feet amsl)
285.00
284.50
284.00
283.50
283.00
282.50
2/1/2012
4/1/2012
6/1/2012
8/1/2012
10/1/2012
12/1/2012
2/1/2013
4/1/2013
6/1/2013
8/1/2013
10/1/2013
12/1/2013
2/1/2014
4/1/2014
6/1/2014
8/1/2014
10/1/2014
12/1/2014
Date


GROUNDWATER HYDROGRAPH WELL 43
Groundwater Elevation (feet amsl)
275.00
270.00
265.00
260.00
255.00
250.00
245.00
3/15/1982
3/15/1984
3/15/1986
3/15/1988
3/15/1990
3/15/1992
3/15/1994
3/15/1996
3/15/1998
3/15/2000
3/15/2002
3/15/2004
3/15/2006
3/15/2008
3/15/2010
3/15/2012
3/15/2014
Date


OBS-1 Transducer Data Points - Fourth Quarter 2014
Groundwater Elevation (feet amsl)
310.50
310.45
310.40
310.35
310.30
310.25
310.20
310.15
310.10
310.05
310.00
08/08/14
08/15/14
08/22/14
08/29/14
09/05/14
09/12/14
09/19/14
09/26/14
10/03/14
10/10/14
10/17/14
10/24/14
10/31/14
11/07/14
11/14/14
11/21/14
11/28/14
Date
Series1


OBS-1 Daily Average - Fourth Quarter 2014
Groundwater Elevation (feet amsl)
310.50
310.45
310.40
310.35
310.30
310.25
310.20
310.15
310.10
310.05
310.00
08/08/14
08/15/14
08/22/14
08/29/14
09/05/14
09/12/14
09/19/14
09/26/14
10/03/14
10/10/14
10/17/14
10/24/14
10/31/14
11/07/14
11/14/14
11/21/14
11/28/14
Date
OBS-1 Daily Average