# Board Meeting



WATER STORAGE DISTRICT

June

#### **AGENDA**

#### NORTH KERN WATER STORAGE DISTRICT BOARD OF DIRECTORS REGULAR MEETING

Due to COVID-19 and consistent with Executive Order N-29-20 suspending provisions of the Brown Act to allow for public meetings to be conducted remotely, the North Kern Water Storage District will hold its regular Board of Directors meeting by teleconference. There will be no meeting site open to the public. Public participation is encouraged using the teleconference information referenced below.

#### Microsoft Teams Link:

#### Join Microsoft Teams Meeting

+1 619-494-2904 United States, San Diego (Toll) (877) 567-8582 United States (Toll-free) Conference ID: 252 085 080#

Tuesday, June 15, 2021 - 7:00 a.m.

#### <u>CALL TO ORDER</u> PUBLIC COMMENT

- 1. Board Meeting Minutes
  - A. Approve Minutes of May 18, 2021 Regular Board Meeting
- 2. General Informational Items
  - A. District Coronavirus/Covid-19 Operations\*
  - B. Kern River Watermaster Report
  - C. Kern River Watershed Coalition Authority\*
  - D. District Groundwater Levels
  - E. PGE Monthly Analysis
  - F. District Exchange Balances
  - G. Operations Report
- 3. Financial Matters
  - A. Approve Treasurer's Report
    - 1. NKWSD
    - 2. RRID
  - B. Monthly Financial Statements
  - C. Water Sales
  - D. Accounts Receivable
  - E. Approve Accounts Payable
- 4. Consulting District Engineer
  - A. Project Summary
  - B. Poso Creek RWMG\*
  - C. Status of Grants\*
  - D. Irrigated Lands Regulatory Program/CV-Salts\*
  - E. Rosedale Ranch ID\*
  - F. Project Highlight\*

- 5. Budget and Personnel Committee
  - A. Approve VRB revised Treasury Management Services (Positive Pay Procedures)
- 6. Engineering Committee
  - A. Approve Contract for Water Meter Installation, NK-617 Project
  - B. Award Contract for Instrumentation and Control Services, Phase III of the WDI Project
  - C. Adopt Negative Declaration for North Kern Water Storage District, Califia Farms Recycled Water Project
  - D Approve Solar Power Services Agreement and Contracts for PV Project
- 7. Groundwater Committee
  - A. Kern Groundwater Authority\*
  - B. NKWSD Landowner Banking Program\*
- 8. Produced Water Ad Hoc Committee\*
- 9. Negotiating Committee\*
- 10. Counsel of District\*
- 11. Rosedale Ranch Improvement District\*
- 12. General Manager's Report\*

#### OTHER BUSINESS

- 13. Closed Session Matters:
  - A. CONFERENCE WITH LEGAL COUNSEL EXISTING LITIGATION (Govt. Code Section 54956.9(a))
    - (i) North Kern Water Storage District v. City of Bakersfield (VCSC #56-2011-00408712-CU-CO-VTA)
    - (ii) Appeal of Regional Board General Order (R5-2013-0120) for Tulare Lake Basin to State Water Resources Control Board (re. Irrigated Lands Regulatory Program)
  - B. CONFERENCE WITH LEGAL COUNSEL ANTICIPATED LITIGATION (Govt. Code Section 54956.9(b))
  - C. PERSONNEL MATTERS (Govt. Code Section 54957)
  - D. CONFERENCE WITH REAL PROPERTY NEGOTIATORS (Govt. Code Section 54956.8)—use of District and landowner facilities for various potential water management programs; negotiator, Richard Diamond
- 14. Adjournment

<sup>\*</sup>Oral report to be provided at the meeting.

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 1A

#### **BOARD OF DIRECTORS**

#### North Kern Water Storage District Minutes of the Meeting of May 18, 2021

A Meeting of the Board of Directors of North Kern Water Storage District was held via teleconference (due to the continued severity of COVID-19 and consistent with Executive Order N-29-20 suspending provisions of the Brown Act) starting at 7:00 a.m., on May 18, 2021.

President Andrew declared a quorum was present and called the meeting to order. The following Directors were present: Kevin Andrew, Carole Fornoff, Joel Ackerknecht, Kristen Camarena and Winn Glende. Others present: David Hampton (General Manager), Ram Venkatesan (Deputy General Manager), Marinelle Duarosan (Controller), Angel Ventura (Staff Engineer), Heather Williams (Operations Superintendent), Christy Castaneda (Administrative Assistant) and Erica Celedon (Accounting Clerk) of North Kern Water Storage District, Scott Kuney (District Counsel - Young Wooldridge), Stephanie Hearn (GEI – Consulting Engineer), Guests present: Leta Spencer and George Capello.

President Andrew called the meeting to order at 7:01 am and opened the floor for public comments. At this time there were none.

#### Board of Directors -

(21-64) Upon motion of Director Fornoff, seconded by Director Ackerknecht and unanimously carried, to approve the minutes from the April 20, 2021 Regular Board meeting.

(Ayes: Andrew, Ackerknecht, Glende, Camarena & Fornoff, Noes: None, Absent: None, Abstain: None)

General Manager Hampton addressed the District operation amidst Coronavirus/Covid-19 situation. He and District managers indicated office employees returned to working in the office and operations and maintenance work continues with employees working independently with all employees following mandated guidelines. The District has also provided all employees with the proper PPE, latest Covid-19 information and training.

Watermaster – General Manager Mr. Hampton briefly touched on the latest Department of Water Resources water supply forecast for May.

Kern River Watershed Coalition Authority – General Manager Hampton stated the meeting for May 6th was cancelled and the next meeting is scheduled for June 3, 2021.

Operations Report – Operations Superintendent Williams reported on District operations stating that the District's share of Isabella storage is estimated at 25,100 AF. Kern River natural inflow and outflow are averaging 570 cfs and 380 cfs, respectively. The District's is receiving 3 CFS Kern River entitlement.

The District started to return water deliveries via the Friant to KTWD on May 1 Califia Farms also continues to discharge 1 cfs into the Lerdo Canal. The CRC produced water was diverted to the Lerdo canal on May 3<sup>st</sup>.

#### Financial Matters –

(21-65) Upon motion of Director Glende, seconded by Director Ackerknecht and unanimously carried, to receive and file the Treasurer's Report for the North Kern Water Storage District for the month of April as presented.

(Ayes: Andrew, Ackerknecht, Glende, Camarena & Fornoff, Noes: None, Absent: None, Abstain: None)

(RR21-66) Upon motion of Director Glende, seconded by Director Ackerknecht and unanimously carried, to receive and file the Treasurer's Report for the Rosedale Ranch Improvement District for the month of April as presented.

(Ayes: Andrew, Ackerknecht, Glende, Camarena & Fornoff, Noes: None, Absent: None, Abstain: None)

The Financial Statement, Summary of Water Sales, Deposits and the Accounts Receivable report for the month of April were reviewed and accepted as presented.

- Upon motion of Director Camarena, seconded by Director Glende and unanimously carried, to approve for payment the Accounts Payable for the North Kern Water Storage District for the month of April as presented.

  (Ayes: Andrew, Ackerknecht, Glende, Camarena & Fornoff, Noes: None, Absent: None, Abstain: None)
- (RR21-68) Upon motion of Director Fornoff, seconded by Director Ackerknecht and unanimously carried, to approve for payment the Accounts Payable for the Rosedale Ranch Improvement District for the month of April as presented.

  (Ayes: Andrew, Ackerknecht, Glende, Camarena & Fornoff, Noes: None, Absent: None, Abstain: None)

#### Consulting District Engineer – Ms. Hearn reported:

- A. Poso Creek RWMG: Ms. Hearn stated they have completed the Drought Contingency Plans for the region and will be submitted for approval within the next Board Meeting. North Kern's recent Reclamation grant award of \$2,000,000 is to continue lining the Calloway Canal and implement Phase 3 of the WDI project.
- B. Grants for Projects: GEI received notice that the district did not receive grant funding for NRCS. The group is to meet with NRCS to discuss what they were looking for, and where funding was prioritized.
- C. Irrigated Lands Regulatory Program/CV-Salts: Ms. Hearn stated the State Water Board had an open public comment session this last month on Priority one early action plan. Two State board members attended and left it clear that they will be sticking to the schedules & timelines.
- D. Rosedale Ranch ID: GEI is waiting on Prop 218 study. She also stated they are providing very little amount of support to Provost & Pritchard.
- E. Project Highlight: Ms. Hearn stated GEI has received notice from the Regional Board requesting additional information for the Report of Waste Discharge but have no concerns regarding the proposed change in discharge volume. The Public comment period ends June 1<sup>st</sup>.

Budget and Personnel Committee – No report at this time

#### Engineering Committee –

(21-69) Upon motion of Director Glende, seconded by Director Ackerknecht and unanimously carried, to authorize General Manager to execute the third amendment to the Utility Agreement 1.0 with California Rail Builders for the High-Speed Rail CP-4 Project.

(Ayes: Andrew, Ackerknecht, Glende, Camarena & Fornoff, Noes: None, Absent: None, Abstain: None)

- Upon motion of Director Fornoff, seconded by Director Camarena and unanimously carried, to authorize the General Manager to award a contract to the lowest qualified contractor for furnishing and installing SCADA communication poles for the Phase III of the Water Delivery Improvement project in an amount not-to-exceed \$50,000. (Ayes: Andrew, Ackerknecht, Camarena & Fornoff, Noes: None, Absent: None, Abstain: Glende)
- Upon motion of Director Ackerknecht, seconded by Director Camarena and unanimously carried, to authorize the General Manager to award a contract to South Coast Controls for the PLC Control Panels NK-616 project in an amount not-to-exceed \$550,000.

(Ayes: Andrew, Ackerknecht, Glende, Camarena & Fornoff, Noes: None, Absent: None, Abstain: None)

General Manager Hampton stated he has been reviewing previous work the District has done for the potential landowners Surface and subsurface ground water. He indicated he reviewed draft agreements and information and will pick up where it was left off.

Groundwater Ad Hoc Committee – No report at this time

Produced Water Ad Hoc Committee –No report at this time

Negotiating Committee – No report at this time

Counsel of District – No Report at this time

Rosedale Ranch – No Report at this time

General Manager's Report – No Report at this time

The President publicly stated that the legal authorities for holding Closed Session at today's Board Meeting are the following sections of the California Government Code:

- A. CONFERENCE WITH LEGAL COUNSEL EXISTING LITIGATION (Govt. Code Section 54956.9(a))
  - (i) North Kern Water Storage District v. City of Bakersfield (VCSC #56-2011-00408712-CU-CO-VTA)
  - (ii) Appeal of Regional Board General Order (R5-2013-0120) for Tulare Lake Basin to State Water Resources Control Board (re. Irrigated Lands Regulatory Program)
- B. CONFERENCE WITH LEGAL COUNSEL ANTICIPATED LITIGATION (Govt. Code Section 54956.9(b))
- C. PERSONNEL MATTERS (Govt. Code Section 54957)
- D. CONFERENCE WITH REAL PROPERTY NEGOTIATORS (Govt. Code Section 54956.8)—use of District facilities for various potential water management programs; negotiator, Richard Diamond

The above legal grounds were determined to exist based on advice of counsel, and discussion of such matters in an Open Session would cause prejudice to the District. The Board went into Closed Session at 8:00 a.m. The Board reconvened back into open session at 10:30 a.m. and it was noted the following actions were taken in closed session.

(21-72)	Upon motion of Director Glende, seconded by Director Fornoff and unanimously carried to adjourn the meeting at 10:30 a.m. (Ayes: Andrew, Ackerknecht, Glende, Camarena & Fornoff, Noes: None, Absent: None, Abstain: None)
	Respectfully Submitted,
Approved by	·
June 15, 20  Kevin Andı	rew, President

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 2B



### ISABELLA LAKE, CA CONSTRUCTION

#### U.S. ARMY CORPS OF ENGINEERS

BUILDING STRONG®

#### **Location & Description**

June 2021

Isabella Lake Dam (consisting of a Main Dam, Auxiliary Dam and service spillway) is located about 40 miles northeast of Bakersfield in Kern County, California, and became fully operational in 1953. The Main Dam is located near the confluence of the north and south forks of the Kern River and the Auxiliary Dam is located about half a mile east of the Main Dam. The Main Dam is a 185-foot-high earth-fill dam, and the Auxiliary Dam is a 100-foothigh earth-fill dam. The service spillway is located between the two dams. The reservoir (Isabella Lake) has a gross storage capacity of 568,075 acre feet.



#### **Advisory**

- USACE has established enhanced protocols to ensure the safety
  of our employees and our partners, and to take necessary precaution to prevent the spread of COVID-19.
- The Phase II Dams and Spillways contractor continues construction activities. As a result, the site
  including Engineers Point is an active construction area and is off limits to the public.
- Corps policy prohibits public operation of unmanned aircraft systems, such as drones, on or above federal lands and waters managed by USACE. The policy is intended to ensure critical infrastructure security and public safety.

#### Looking Ahead Next 30+ days)

- Excavation and slope stabilization continues on the Emergency Spillway (pictured above). Steel rebar, slab, and wall placement work also continues on the Labyrinth Weir.
- Auxiliary Dam embankment continues to work towards elevation 2637 so that work at the dogleg adjacent to HWY 178 can begin in mid-June.
- Main Dam embankment began May 24 and will continue through the end of September.
- USACE provided a briefing to the US Forest Service on May 26 to present an overview of the alternative site locations for the permanent relocation of the visitor center. USFS is currently evaluating all site alternatives and expects to reach a decision by mid-June. The Final EA is scheduled to be complete by the end of June.
- USACE will provide updates on any changes via public outreach, the monthly SITREP, and the Isabella Task Force engagements.

#### Current Lake Status (as of June 1, 2021)

The current pool resides at 94,445 acre-feet (elevation 2,545 feet-IPD), which is 26% of restricted pool.

As part of our interim risk reduction measures, Isabella Lake is restricted to 361,250 acre-feet (elevation 2,585.5 feet-IPD) outside of flood season. During flood season (~November-March), flood conservation pool is restricted to 170,000 acre-feet (elevation 2,560.4 feet-IPD). Current lake status can be viewed at <a href="https://go.usa.gov/xE2pX">https://go.usa.gov/xE2pX</a>

Milestones	
Pre-Construction Engineering and Design	Complete
Construction of USFS Fire Station and Admin Facilities	Complete
U.S. Forest Service Visitor's Information Center	In Planning
Dams and Spillways Construction	2018-2022

#### B-120 WATER SUPPLY FORECAST UPDATE SUMMARY

#### **UNIMPAIRED FLOW FOR - JUNE 2021**

(Provisional data, subject to change)

Report generated: June 03, 2021 11:47

DAYS OF MONTH	JUN	IE 02						
			A1 VOI	0/ 44/6	41 VOI	0/ 44/6	ATVOL	0/_44/6
WATERSHED PERCENTILES	AJ VOL	% AVG	AJ VOL	% AVG	AJ VOL	% AVG	AJ VOL	% AVG
Shasta Lake, Total Inflow	720	42						Average = 1,7
00% Exceedance	730	42						
50% Exceedance	760	43						
.0% Exceedance	790	45						A
Sacramento River above Bend Bridge (near Red Bluff)	1.040	42						Average = 2,4
00% Exceedance	1,040	43						
50% Exceedance	1,080	45						
.0% Exceedance	1,130	47						Average = 1.7
Feather River at Oroville 200% Exceedance	400	20						Average = 1,7
50% Exceedance	480 520	28 31						
.0% Exceedance								
	560	33						Average - 06
'uba River near Smartsville 10% Exceedance	270	20						Average = 96
50% Exceedance	270 290	28 30						
10% Exceedance		32						
	310	32						Average = 1.1
American River below Folsom Lake	250	29						Average = 1,1
	350							
50% Exceedance	370	31						
.0% Exceedance	390	33						A. (040.00 - 4F
Mokelumne River, Inflow to Pardee Reservoir  OW Exceedance	145	22						Average = 45
0% Exceedance	145 150	32 33						
.0% Exceedance	160	35						
Stanislaus River below Goodwin Res (blw New Melones)	100	33						Average = 68
90% Exceedance	195	29						Average – 00
50% Exceedance	210	31						
.0% Exceedance	230	34						
Fuolumne River below La Grange Res (blw Don Pedro)	250	27						Average = 1,1
00% Exceedance	440	37						Average - 1,1
50% Exceedance	470	39						
.0% Exceedance	510	43						
Merced River below Merced Falls (blw Lake McClure)	510	73						Average = 62
90% Exceedance	200	32						Average – 02
50% Exceedance	220	35						
.0% Exceedance	240	39						
San Joaquin River below Millerton Lake	240	33						Average = 1,2
00% Exceedance	340	28						Average - 1,2
50% Exceedance	370	30						
1.0% Exceedance	400	33						
DAYS OF MONTH	_	E 02						
WATERSHED PERCENTILES	AJ VOL	% AVG	AJ VOL	% AVG	AJ VOL	% AVG	AJ VOL	% AVG
Kings River below Pine Flat Reservoir								Average = 1,2
90% Exceedance	275	23						
50% Exceedance	300	25						
.0% Exceedance	325	27						
Kaweah River below Terminus Reservoir								Average = 28
00% Exceedance	45	16						
0% Exceedance	50	18						
0% Exceedance	55	19						
ule River below Lake Success								Average = 6
0% Exceedance	5	8						
0% Exceedance	5	8						
0% Exceedance	6	10						
Kern River, Inflow to Lake Isabella								Average = 45

APRIL-JULY FORECAST UPDATE SUMMARY (IN THOUSANDS OF ACRE-FEET)									
90% Exceedance	73		16						
50% Exceedance	80		17						
10% Exceedance	90		20						
			NOTES						

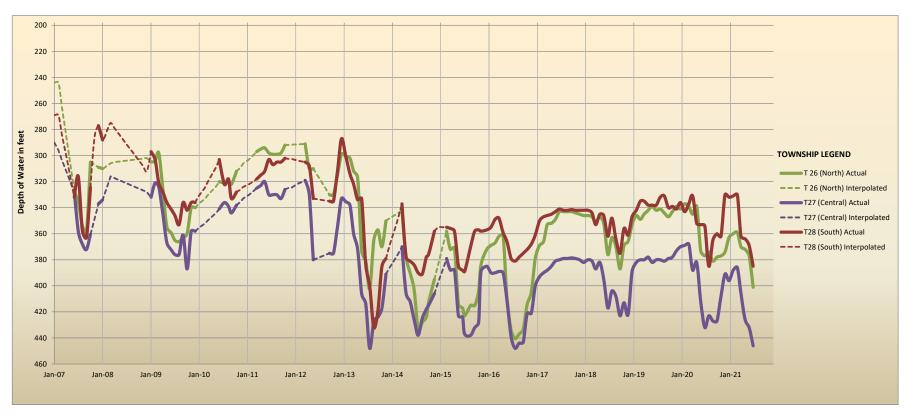
- Runoff forecasts are unimpaired (full natural) flows which represent the natural water production of the river basin, unaltered by upstream diversions, storage, or export or import of water to or from other watersheds.
- Runoff exceedance levels are derived from historical data. The 90 percent exceedance level and the 10 percent exceedance level together comprise a range about the median forecast in which the actual runoff should fall 8 times out of 10.
- Forecasts are stated in 1,000's of acre-feet and percent of (50-year) average.
- The averages are for the period 1966 to 2015.

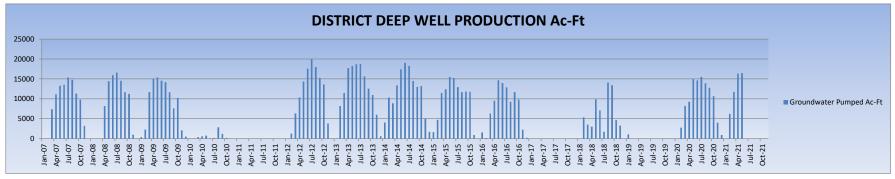
	CONTACT INFORMATION									
FIRST NAME	LAST NAME	EMAIL	PHONE							
Sean	de Guzman	Sean.deGuzman@water.ca.gov	(916) 572-2208							
Andrew	Reising	Andrew.Reising@water.ca.gov	(916) 574-2181							
Ashok	Bathulla	Ashok.Bathulla@water.ca.gov	(916) 574-2634							
Lauren	Alkire	Lauren.Alkire@water.ca.gov	(916) 574-1433							
Anthony	Burdock	Anthony.Burdock@water.ca.gov	(916) 574-2637							

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 2D

### NORTH KERN WATER STORAGE DISTRICT AVERAGE MONTHLY GROUNDWATER LEVELS BY TOWNSHIP





# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 2E

EXHIBIT "A"

COMPARISON OF 2020 ACTUAL AND 2021 ACTUAL ENERGY COST PER ACRE FOOT

Month	ESTIMATED PRODUCTION 2021 AF see note 2	ACTUAL COST	ESTIMATED \$/AF see note 3	ACTUAL Adj \$/AF see note 4	PREVIOUS PUMPING YEAR 2020 Actual \$/AF
1	248	18,455		73	94
2	5,896	-,		108	101
3	7,551	727,856	96	94	93
4	14,719	1,636,066	111	109	96
5	10,561	1,294,755	123	120	98
Est Ac.ft	38,975	4,325,731			96

Actual 39,782	101 / AF average

- 1 PG&E bill period is usually mid month to the following mid month. Estimated monthly Acft will vary because of the bill period.
- 2 Estimated Acft are calculated by multiplying estimated hours times deepwell production and may under estimate the acft.
- 3 The estimated average \$/AF is calculated by dividing the total deepwell PG&E bills by the total estimated Acft and over may over estimate average \$/AF.
- The corrected average \$/AF is calculated by multiplying the estimated average \$/AF by the estimated total Acft and diving by the actual total Acft.

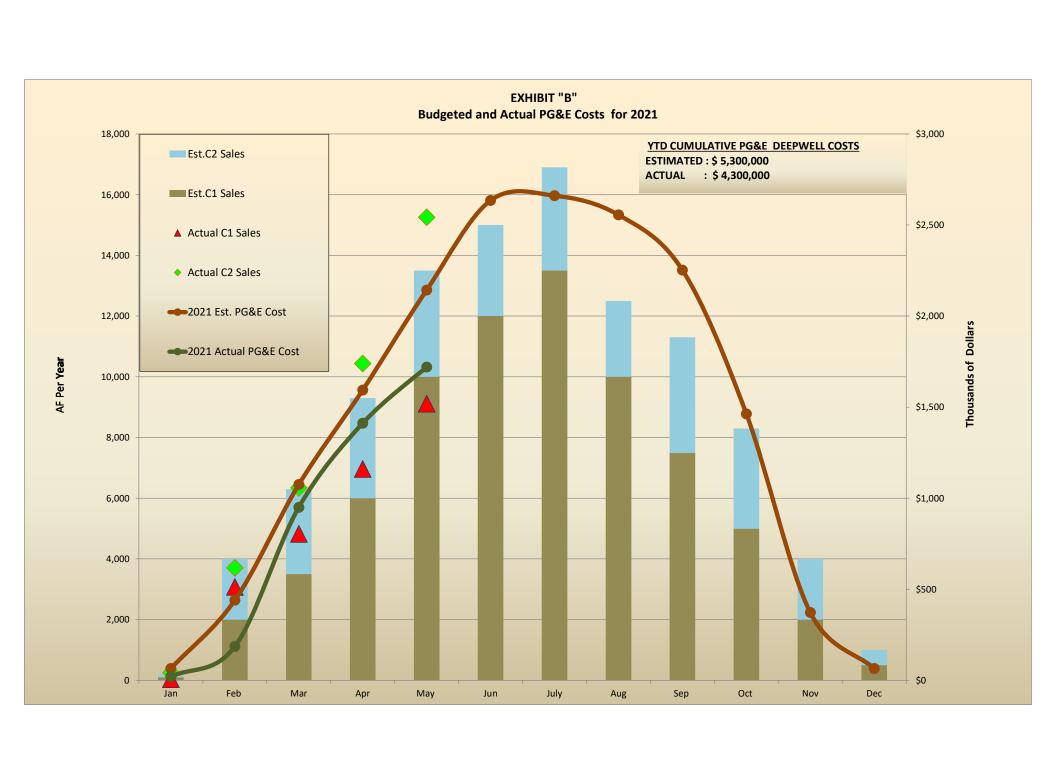


EXHIBIT "C"
2021 ACTUAL COST PER AF TO PUMP USING NATURAL GAS ENGINES

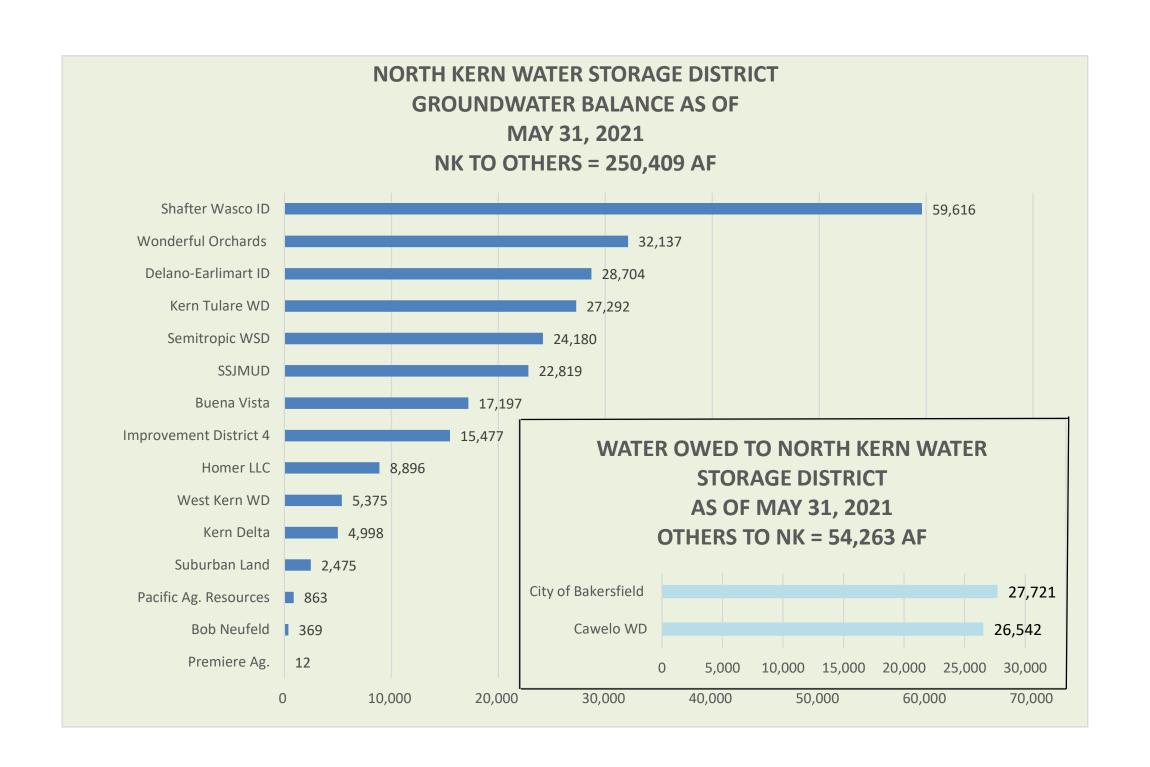
	ACTUAL PRODUCTION	ACTUAL COST	ACTUAL	ESTIMATED 2021 PGE
Month	2021 AF	<b>2021</b> \$	\$/AF	\$/AF
1	0	50		73
2	175	8,070	46	108
3	185	8,624	47	94
4	350	13,975	40	109
5	239	8,915	37	120
		·	<u> </u>	0.0

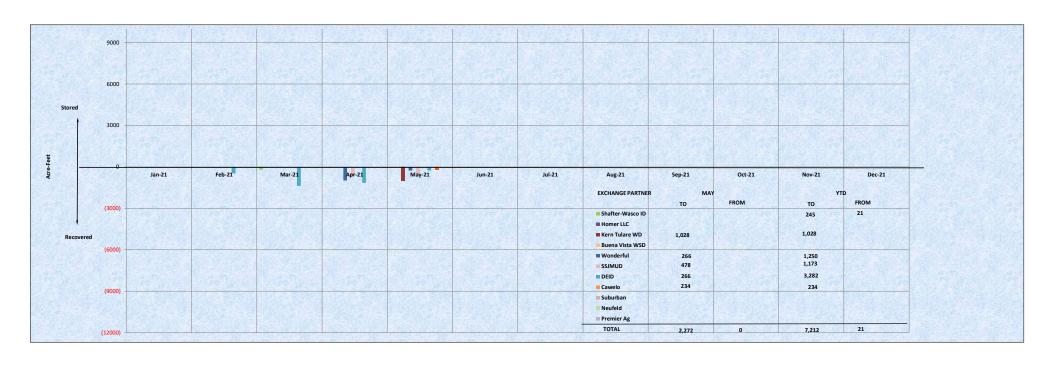
Actual 949 39,634 **42 / AF average** 

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 2F

# NORTH KERN WATER STORAGE DISTRICT EXCHANGE BALANCES AS OF MARCH 31, 2021





P.O. Box 81435 Bakersfield, CA 93380-1435 Administration

Telephone: 661-393-2696 Facsimile: 661-393-6884



33380 Cawelo Avenue Bakersfield, CA 93308-9575 Water Orders and Operations Telephone: 661-393-3361 www.northkernwsd.com

### NORTH KERN WATER STORAGE DISTRICT

June 15, 2021

TO: BOARD OF DIRECTORS

FROM: Heather Williams

RE: Operations Report

#### Operations

- 1. Lake Isabella storage is currently 87,994 AF. The Natural Inflow is averaging 325 CFS and the Regulated Outflow is 715 CFS. The District's share of storage is estimated to be 22,000 AF and we are receiving zero Kern River entitlement.
- 2. To meet all Class 1 and Prorated Class 2 irrigation demands, we are utilizing Kern River supplies and the District's D/Wells and regulating reservoirs. Earlier this month, we began diverting and average of 70 CFS/day of Kern River supplies. The District's well production is averaging 260 CFS/day and the Private well production is averaging 72 CFS/day.
- 3. Return water deliveries continue being made to DEID, KTWD and SSJMUD. To date, the District has returned an estimated 3,400 AF to DEID, 1,300 AF to SSJMUD and 1,380 AF to KTWD.
- 4. Root Creek deliveries to SWID totaled 266 AF in May. An estimated 5 CFS/day continues to be delivered to SWID in June. To date, an estimated 1,350 AF has been delivered.
- 5. CRC produced water is averaging 12 CFS/day into the Lerdo and Califia continues with 1 CFS.

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 4A

# Monthly Consulting Engineers' Report for North Kern Water Storage District



### Summary of Project Activity in May 2021

Submitted by

**GEI Consultants, Inc.** 5001 California Avenue, Suite 120 Bakersfield, CA 93309 T: 661-327-7601

#### **General Services (GEI Project No. 2100359)**

General consulting activities in May included preparation for and attendance of the Board meeting and a limited number of hours to support other district requests.

Upcoming Deliverables: Preparation for and participation in Board meeting and other services as requested.

Active Task Order No.: 21-01

**Budget Status:** \$35,256 expended of \$60,000 budget (59%) **Budget Forecast:** No foreseeable need for additional budget.

#### Legal Counsel Support (GEI Project No. 1611225)

Activities during the month were limited to updating our database with 2020 Kern River data.

*Upcoming Deliverables:* None at this time.

Active Task Order No.: 20-02

**Budget Status:** \$6,795 expended of \$75,000 budget (9%)

Budget Forecast: No foreseeable need for additional budget.

#### NKWSD SGMA Implementation Support 2021 (GEI Project No. 2100361)

Activities in May included attending the KGA Board meeting for discussion on subbasin-wide DMS and other items of interest. GEI also reviewed and provided comments on the draft Kern Subbasin SMC Exceedance Policy document, which is being discussed among the KGA managers. Per the SOP developed for the districts and cities to use in semi-annual groundwater quality sampling, GEI reviewed the results of groundwater quality analysis and groundwater levels. The SGMA Landowners' Committee held its quarterly meeting, via Microsoft Teams, on May 17th. GEI coordinated the meeting and developed the agenda to provide members of the committee with updates on the District's SGMA implementation and to discuss activities within the District and with KGA.

Upcoming Deliverables: None Active Task Order No.: 21-02

**Budget Status:** \$9,680 expended of \$40,000 budget (24%)

#### High Speed Rail (GEI Project No. 1605740)

Activities in May included assisting the District with RFI and design related questions on Canal 9-22 and 9-26, preparation of reimbursement Invoice Package 43, and revisions to Invoice Packages 42, 41, and 40. Additionally, GEI assisted with responses to RFC drawings, and Work Plan for Canals 9-26 and 9-22.

*Upcoming Deliverables:* Invoice package #43 and #44

Active Task Order No.: 20-07 (Add-on to 19-07, 18-09, and 02-2017)

**Budget Status**: \$206,295 expended of \$239,323 budget (86%)

**Budget Forecast:** The current scope of work is expected to be completed within the authorized budget. A budget amendment will be discussed if the scope of work increases.

#### Ag Water Management Plan Update (GEI Project 2005378)

In May, GEI continued revising the draft Agricultural Water Management Plan (AWMP) 2020 Update, which is a five-year update to its 2015 AWMP, required to maintain compliance with the requirements of the Department of Water Resources (DWR) guidance document: A Guidebook to Assist Agricultural Water Suppliers to Prepare a 2020 Agricultural Water Management Plan, dated August 2020.

**Upcoming Deliverables:** Draft of AWMP

Active Task Order No.: 20-15

**Budget Status:** \$33,411 expended of \$35,000 budget (95%)

Budget Forecast: This project is expected to be completed within the authorized budget.

### Monitoring and Reporting Plan Development for On-Farm Recharge Projects (GEI Project No. 2004704)

GEI will have a draft report for review by the District in June.

Upcoming Deliverables: Draft recommendations

Active Task Order No.: 20-10

**Budget Status:** \$6,007 expended of \$16,500 budget (36%)

#### CEQA and NEPA for 2021 Expanded Water Banking Program (GEI Project No. 2101049)

Activities in May included evaluation of historically unused well capacity for the Groundwater Assessment; attending internal and client coordination meetings; and completion of project management tasks.

Upcoming Deliverables: Draft Environmental Impact Report, Groundwater Assessment, Cultural Resources Inventory Report, and Biological Assessment

Active Task Order No: 21-04

**Budget Status:** \$9,879 expended of \$315,900 budget (3%)

Budget Forecast: This project is expected to be completed within the authorized budget.

#### **CEQA for Califia Farms (GEI Project No. 2005123)**

Activities in May included filing the Draft Initial Study/Mitigated Negative Declaration with State Clearinghouse and issuing a check to cover the California Department of Fish and Wildlife CEQA filing fee for the Final IS/MND.

Upcoming Deliverables: Notice of Determination

Active Task Order No.: 19-12; additional budget authorized via email by Cassandra Todd of Califia.

**Budget Status:** \$14,651 expended of \$17,430 budget (84%)

Budget Forecast: On June 2, 2021, Cassandra Todd of Califia Farms approved the CEQA budget augmentation for the filing of the Notice of Determination and payment of the CDFW and County CEQA filing fees for reimbursement.

#### WDI Phase 2 (GEI Project No. 2001515)

Activities related to Administrative and Reporting work included:

- Approval of the scope modification for R16AP00172 was received on May 5.
- Approval of the scope modification for R17AP00159 was received on May 11.

#### Upcoming Deliverables:

- Revisions to Draft Final Report for DWR.
- Reclamation Final Reports due December 2021

#### Active Task Order No.: 20-04 Addendum

Because the remaining grant funds will be used to reimburse construction costs, a minimal amount of GEI Task Order 20-04 will be reimbursed. The majority of GEI Task Order 20-04 will be cost match.

**Budget Status:** \$185,210 expended of \$186,000 budget (99%)

#### WDI Phase 3 and Canal Lining (R19AP00140 and R20AP00064) (GEI Project 2004274)

Activities related to Grant Administration and Reporting included:

- Monthly call with Reclamation
  - o The Notices to Proceed for both grants were received on May 25.

Activities related to WDI Contracting included:

- Weekly meetings with District and ProUsys
- Solicit and review quote for NK 616 (PLC Panels).
  - o The NOA for NK 616 was issued on June 4 for a contract amount of \$480,592.82
- Prepare specifications for NK 617 (Flowmeters) and 618 (Electrical)
  - o The Request for Quotes for NK 617 was sent on June 3

*Upcoming Deliverables:* Prepare NTP for NK 616; review proposal for NK 617, prepare NOA and NTP; continued preparation of specifications for NK 618, solicit quotes for NK 618

Active Task Order No.: 21-03

**Budget Status:** \$46,190 expended of \$98,500 budget (47%)

Budget Forecast: This phase of work is expected to be completed within the authorized budget. Task Order 21-03 was approved at the February meeting for Grant Administration and Reporting through 2021 and WDI tasks through award of implementation contracts. Subsequent Task Orders will be submitted for consideration in the summer of 2020, after contracts NK 616, 617, and 618 are awarded, for WDI contract management tasks, and at the end of the year for Canal Lining tasks.

#### **NEPA for Calloway Canal Lining Project (GEI Project No. 1904937)**

Activities in May included review of the Categorical Exclusion Checklist issued by U.S. Bureau of Reclamation and attending a coordination meeting to discuss the project.

Upcoming Deliverables: None Active Task Order No.: 19-11

**Budget Status:** \$50,008 expended of \$53,102 budget (94%)

Budget Forecast: This project is expected to be completed within the authorized budget.

#### 2018 Return Capacity Improvements (GEI Project No. 1804180)

Activities in May included general project administration, and coordination with GEI's environmental team to prepare for NEPA modifications. Preliminary design work related to the survey was initiated. A time extension request has also been initiated.

*Upcoming Deliverables:* Continued minimal design work as needed, grant scope modification and agreement time extension due to the change in wells/pipeline alignments.

Active Task Order No.: 18-12

**Budget Status:** \$26,487 expended of \$70,000 budget (38%)

#### **Environmental Documentation for 2018 Return Capacity Improvements (GEI Project** No. 1804142)

Activities in May included revisions to the water quality memo and ledger program memo and preparation of the addendum to the cultural resources inventory report.

Upcoming Deliverables: Revised Draft Initial Study/Mitigated Negative Declaration, Revised Cultural Resources Inventory Report, Revised Biological Assessment, Revised Water Quality memo, and Revised Water Quality Ledger Program memo.

Active Task Order No.: 18-13

**Budget Status:** \$144,624 expended of \$162,276 budget (89%)

Budget Forecast: This project is expected to be completed within the authorized budget.

#### 2020 Return Capacity Improvements (GEI Project No. 2101445)

Activity in May was limited to minimal reimbursement follow up with Reclamation and the District.

Upcoming Deliverables: Semi-annual report due October 30

Active Task Order No.: 21-06

**Budget Status:** \$687 expended of \$8,500 budget (8%)

Budget Forecast: The current authorized budget is limited to project management, grant reporting, and grant administration for the 2021 calendar year. Additional budget will be requested for future grant management, design, and other implementation tasks.

#### **Environmental Documentation for 2020 Return Capacity Improvements (GEI Project** No. 2101050)

Activities in May included completion of the cultural resources pedestrian survey, preparation of a Health and Safety Plan, preparation of the Draft Cultural Resources Inventory Report and Draft IS/MND, coordination with North Kern.

Upcoming Deliverables: Draft Initial Study/Mitigated Negative Declaration, Draft Biological Assessment, and Draft Cultural Resources Inventory Report.

Active Task Order No: 21-05

**Budget Status:** \$24,937 expended of \$75,800 budget (33%)

### **Pending Projects**

#### **Grant Application Support (GEI Project No. 2001514)**

Recall that Reclamation announced in March that the \$2,000,000 application for Calloway Canal lining from 7th Standard Road to 8-1 Backup Weir was awarded. The agreement development phase will commence with a kick-off meeting with Reclamation in the next few months.

Upcoming Deliverables: Participate in Initial Recipient Conference Call (IRCC) and respond to Reclamation's request for additional information through the pre-award phase.

Active Task Order No.: 20-08 (Task 2)

**Budget Status:** \$6,908 expended of \$10,000 budget (69%)

Budget Forecast: Since the grant is awarded additional budget may be required to complete the agreement and implementation phases.

#### **CEQA Compliance N. Kern River Region Water Conservation (GEI Project No. 1800123)**

No current activity.

Upcoming Deliverables: Notice of Preparation

Active Task Order No.: 18-01

**Budget Status:** \$4,515 expended of \$319,538 budget (1%)

**Budget Forecast:** This project is expected to be completed within the authorized budget.

#### RRID Groundwater Recharge Information Study (GEI Project No. 2004230)

The Technical Memorandum summarizing the study and findings was completed and submitted to the District.

Upcoming Deliverables: Address District comments on Technical Memorandum

Active Task Order No.: 20-09

**Budget Status:** \$15,645 expended of \$20,000 budget (78%)

Budget Forecast: This project is expected to be completed within the authorized budget.

#### **Projects closed during the month:**

• None this month

#### 1. Ongoing Projects

Ongoing Projects										
Agreement Number	Project Name	Agency	Funding	Program	Start Date	Funding Amount	Finish Date	Status		
	Calloway Canal Lining and WDI	USBR	WE	EEG	9/4/2020	\$1,500,000	9/30/2022	Semi-Annual Report submitted 04/30/2021		
	Scope of Agreement									
R19AP00140	2,200 LF of Calloway Canal Lining from Snow Road to 2,200 LF north of Snow Road; WDI at 23 Production Wells; 15 RTUs; SCADA Integration									
K 19AP00140	Reimbursement Requests									
	Reimbursement Received by NKWSD	Grant Share	Grant Share Budget	DWR Grant Cost Share*	NKWSD Cost Share	Cost Share Budget	Total Expenditures	5/25/2021		
	11/23/2020	\$ 7,616.13		\$ -	\$ 7,927.00		\$ 15,543.13	to be requested.		
	5/10/2021	\$ 16,851.15 <b>\$ 24,467.28</b>	\$1,488,500.00	\$ - \$ -	\$ 17,538.90 <b>\$ 25,465.90</b>	\$ 1,507,447.00	\$ 34,390.05 <b>\$ 49,933.18</b>			

<sup>\*</sup>The related DWR grant is limited to Canal Lining Construction costs. Accordingly, DWR Grant Cost Share will not be reflected until after Canal Lining construction begins in 2022. The related USBR grant cannot be used as Cost Share for another USBR grant; however, in an effort to maximize reimbursement cash flow, each eligible grant cost is split between the two USBR agreements. For the District's out of pocket to date, refer to Section 2. Cost Share.

Agreement Number	Project Name	Agency	Funding	Program	Start Date	Funding Amount	Finish Date	Status		
	Calloway Canal Lining and WDI	USBR	WE	EEG	9/16/2020	\$1,500,000	9/30/2022	Semi-Annual Report submitted 04/30/2021		
	Scope of Agreement									
	3,841 LF of Calloway Canal	Lining from 2,200 L	F north of Snow Integ		ard Road; WI	I at 7 Production V	Vells; SCADA			
R20AP00064	Reimbursement Requests									
	Reimbursement Received by NKWSD	Grant Share	Grant Share Budget	DWR Grant Cost Share*	NKWSD Cost Share	Cost Share Budget	Total Expenditures	Notice to Proceed received 5/25/2021		
	11/23/2020	\$ 13,539.79		\$ -	\$ 14,092.4	.3	\$ 27,632.22			
	5/19/2021	\$ 6,444.04	\$ 1,477,500.00	\$ -	\$ 6,707.0	6 \$ 1,675,170.00	\$ 13,151.10	Time extension		
		\$ 19,983.83		\$ -	\$ 20,799.4	.9	\$ 40,783.32	to be requested.		

<sup>\*</sup>The related DWR grant is limited to Canal Lining Construction costs. Accordingly, DWR Grant Cost Share will not be reflected until after Canal Lining construction begins in 2022. The related USBR grant cannot be used as Cost Share for another USBR grant; however, in an effort to maximize reimbursement cash flow, each eligible grant cost is split between the two USBR agreements. For the District's out of pocket to date, refer to Section 2. Cost Share.

Agreement Number	Project Name	Agency	Funding	Program	Start Date	Funding Amount	Finish Date	Status
	Calloway Canal Lining	DWR	· ·	Round 1 IRWM entation	2/2/2021	\$872,460.97	9/30/2023	
			Scope of A	Agreement				
	1,370 LF of Calloway Canal Lining							
	Reimbursement Requests							
4600013880	Reimbursement Received by NKWSD	Grant Share	Grant Share Budget Cost Share					Quarterly Report submitted
	Limited to canal lining construction. Reimbursement expected late 2022/early 2023	late 2022/early 2023 \$ -	\$ 872,460.97	DWR grant. The being satisfied the Cost Share will entire cost of the above will cover	NKWSD is not required to report any Cost Share to this DWR grant. The Cost Share required by the agreement is being satisfied by other projects in the agreement. While no Cost Share will be reported, this grant will not cover the entire cost of the Canal Lining project. The two USBR grants above will cover a portion of Canal Lining, but some District out of pocket cost is expected.			4/23/2021

NKWSD is the Grantee for the Prop 1 Funding Agreement and will coordinate grant management with the Poso Creek IRWM Group through Semitropic WSD. The agreement includes projects from LHUD, City of Delano, SSJMUD, DEID, NKWSD, SWSD, and SWID. NKWSD's total project budget is \$1,560,471.97, \$872,460.97 of which is Grant Share. NKWSD is not required to report any Cost Share.

Agreement Number	Project Name	Agency	Funding	Program	9	Start Date	Funding Amount	Finish Date	Status		
	Well Recovery and Return Capacity Improvements	USBR	WaterSMART Drought Resilie Grant Program		,	9/12/2019	\$750,000	12/31/2021	Semi-Annual Report submitted 4/30/2021		
	Scope of Agreement										
	Connect 5 existing wells to FKC; Drill, equip, and connect 2 replacement wells										
	Reimbursement Requests										
R18AP00088	Reimbursement Received by	Grant Share	Grant Share	Other Grant	NKWSD		Cost Share	Total			
	NKWSD	Oranic Onlaro	Budget	Cost Share*	С	ost Share	Budget	Expenditures	Time extension		
	5/29/2020	\$ 5,213.66			\$	7,199.98		\$ 12,413.64	request in		
	5/29/2020	\$ 11,310.05		There is no	\$	15,618.65		\$ 26,928.70	progress.		
	11/6/2020	\$ 8,137.66	\$ 722,258.00	other related Grant sharing	\$	11,237.72	\$ 1,043,650.00	\$ 19,375.38			
	Adjustment reporting period	\$ (12,971.07)	φ 122,236.00	the cost of this	\$	(17,912.43)	) 7,043,650.00	\$ (30,883.50)			
	ending 3/31/2021	\$ 285.22	1	project.	\$	393.90		\$ 679.12			
		\$ 11,975.52		,51 3 <b>,300</b>		16,537.82		\$ 28,513.34			

Agreement Number	Project Name	Agency	Funding	Program	Start Date	Funding Amount	Finish Date	Status
R20AP00114	Return Capacity Improvements	USBR	WaterSMART Drought Resiliency Grant Program		9/11/2020	\$750,000	9/30/2023	
	Scope of Agreement							
	Connect 2 existing wells to FKC; Drill, equip, and connect 2 replacement wells							
	Reimbursement Requests							
	Reimbursement Received by NKWSD	Grant Share	Grant Share Budget	Other Grant Cost Share*	NKWSD Cost Share	Cost Share Budget	Total Expenditures	4/30/2021
	5/10/2021	\$ 1,934.42	\$ 735,000.00	There is no other related	\$ 2,461.99	\$ 943,332.00	\$ 4,396.41	
		\$ 1,934.42		Grant sharing the cost of this project.	\$ 2,461.99		\$ 4,396.41	

#### 2. Cost Share

Calloway Canal Lining and WDI Phase 3 Cost Share Distribution							
	USBR R19AP00140	USBR R20AP00064	DWR 4600013880	NKWSD			
Cost Share Amounts	\$24,467.28	\$19,983.83	\$0.00	\$46,265.39			
		ψ40,203.39					

The District's out of pocket expenditure as of the reporting period ending March 31, 2021 is \$46,265.39. The District's share is a portion of the overall project costs not covered by the eligible State and Federal Grant Share; as much as possible, the Federal Grants are used as cost share for the State Grant and vice versa.

#### 3. Pending Projects

Pending Projects						
NK-SSJMUD Intertie (SSJMUD is applicant)	USBR WaterSMART Drought Response Program FY 2021	\$1,500,000	Awarded. SSJMUD is the Grantee.			
Calloway Canal Lining from 7th Standard to 8-1 Weir	USBR WaterSMART WEEG FY 2021	\$2,000,000	Awarded. Agreement development kick-off call with Reclamation pending.			

#### North Kern Water Storage District Grant Funded Projects June 2021

#### 4. Completed Projects

	Calloway Canal Lining from Olive Drive to Snow Road ( 5,553 LF) and WDI Phase 2 (54 Wells)				
Total Projec	ct Cost				Remaining Deliverables
	nal Lining and WDI SCADA Integration	\$ 7,299,973.96 \$ 252,664.20 \$ 7,552,638.16		Small Scale R18AP00244	Reclamation has notified the District that there is \$3,361 of reimbursement left over from their environmental compliance allowance. Reclamation
Small	bursements Scale R18AP00244 Small Scale Pending	\$ (67,000.00)			is drafting a modification; once the modification is complete an ASAP withdraw can be made by the District
	J	\$ (2,856,755.00)		DWR 4600011921	Revisions to Final Report after DWR's review
	USBR R16AP00172	\$ (984,362.00)		USBR R16AP00172	Final Report due December 2021
I	USBR R17AP00119	\$ (278,195.00)		USBR R17AP00119	None. Closed.
	USBR R17AP00159	\$ (986,492.60) \$ (5,176,165.60)		USBR R17AP00159	Final Report due December 2021
NKWSD Ou	t of Pocket	\$ 2,376,472.56	31%		

#### North Kern Water Storage District Grant Funded Projects June 2021

Completed Projects				
Cross Valley Canal to Calloway Intertie		3 of 3 Post Completion Performance Reports submitted to DWR		
CRC Pipeline	Closed out June 2017	2 of 3 Post Completion Performance Reports submitted to DWR. Due annually.		
Calloway Canal Lining (R17AP00119)	Closed out February 2020	No Post Completion Report Required		
Poso Creek IRWM Group Plan Update	Closed out February 2020	Post Completion Performance Reports due annually		
WaterSMART Small Scale Water Efficiency Program (SWEP) SCADA Improvements	Closed out January 2021	There is approximately \$3,000 of reimbursement left over from USBR environmental review. A budget modification is in progress; remaining reimbursement will be processed upon completion of the modification.		

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 5A

P.O. Box 81435 Bakersfield, CA 93380-1435 Administration

Telephone: 661-393-2696 Facsimile: 661-393-6884



33380 Cawelo Avenue Bakersfield, CA 93308-9575 Water Orders and Operations Telephone: 661-393-3361 www.northkernwsd.com

# NORTH KERN WATER STORAGE DISTRICT

June 15, 2021

TO:

BUDGET AND PERSONNEL COMMITTEE

Directors Fornoff and Glende, Alternate Ackerknecht

FROM:

Marinelle Duarosan

RE:

Approval to update Treasury Management Services at VRB – Positive Pay

#### **RECOMMENDED MOTION:**

"Approve to update the Treasury Management Services agreement at Valley Republic Bank as it relates to Positive Pay procedures and execute the attached Bank Resolution for Acceptance of Treasury Management Services"

#### **DISCUSSION:**

The District has been informed by Valley Republic Bank that they are changing the procedures on how checks are processed through Positive Pay from an All Pay to Return All (if not processed) approach. Currently, the District is notified whenever exceptions are noted. The Bank would process payment and proceed to clear the funds whether or not those exceptions were addressed by the District. The Bank has found that this existing procedure has proven to be ineffective in deterring fraudulent transactions. As a result, the Bank is no longer allowing any exceptions to be processed unless specifically approved and addressed by the District.

The attached paperwork updates the previous Treasury Management Services procedures to reflect that ALL exceptions are to be returned to the original maker <u>if</u> the District fails to properly address the exceptions on a timely basis or if the District directly instructs the Bank to return the check (refer to attached Page 2 of 9). No other services are being modified at this time.

Exhibit "A" - Acceptance of Treasury Management Services - Certification (pages 1-3)

Exhibit "B" – Schedule A to Acceptance of Treasury Management Services Security Procedures - (pages 4-6) – Not Applicable

Exhibit "C" – Schedule B to Acceptance of Treasury Management Services – Common Ownership Clients (pages 7-8)

Exhibit "D" – Resolutions for Acceptance of Treasury Management Services (page 9) for North Kern Water Storage District and Kern Groundwater Authority



#### ACCEPTANCE OF TREASURY MANAGEMENT SERVICES

P	Part I – Certification		
<b>√</b>	✓ New Acceptance   Amendmen of Treasury	nt No. to existing Management Services,	Acceptance dated:
wil	Each amendment to this Acceptance will effectively supersede all prior versions will have the meaning provided in the Valley Republic Bank Master Treasury Mand applicable Service Description(s), unless otherwise defined herein.		
("A	The person(s) signing ("Executing Representative(s)") this Acceptance of Treasu ("Acceptance") on behalf of the Client identified in the signature block of this Ac behalf of Client that:		
(a)	(a) Client agrees to be bound by the Bank's Master Treasury Management Service applicable Service Description, including any Supporting Documents, corresenrollments, or attachments to the same, which apply to the services designated Acceptance, and Client's use of any Service, including without limitation eausing after the Effective Date of this Acceptance, confirms Client's agreemen Description relating to that Service;	sponding exhibits, schedated by Client in Part II ach Service that Client c	dules, of this ommences
(b)	(b) For the Wire Transfer Service, Client further agrees to the terms and condition as may be amended from time to time;	ns of Schedule A to this	Acceptance,
(c)	(c) The Client has received a copy of the Master Agreement together with ear Service has been selected by Client below; and	nch Service Description	for which a
(d)	(d) The Executing Representative has full authority to execute this Acceptance of other agreements and Supporting Documents for the Services now or hereaf terminate or otherwise act on behalf of Client with respect to each Service us	fter offered by Bank, a	
Pa	Part II – Service Options		
D	DESIGNATION OF MASTER TREASURY SERVICE OPTIONS.		
CI	Client designates the following Service options (check all that apply):		
<b>V</b>	✓ Online Banking Service		
	Access to the Online Banking Service will be subject to Security Proceeding on the Funds Transfer Service or the ACH Service, out-of-banking Control").		
	Check all that apply:		
	Wire Transfer Service (if checked, includes Client agreement to Service Description)	o the Wire Transfer	
	ACH Origination (if checked, includes Client agreement to the Service Description)	Automated Clearing H	ouse (ACH)

Positive Pay & ACH Positive Pay/Block Service (if checked, includes Client's agreement to the Positive Pay & ACH Positive Pay/Block Service Description).
Default if no timely pay or return designation made for exception:
Return Exceptions
[Initial] CLIENT REJECTION OF POSITIVE PAY & ACH POSITIVE PAY/BLOCK SERVICE: By initialing this Paragraph. Client hereby rejects the use of the Positive Pay & ACH Positive Pay/Block Service and Client further agrees to hold Bank harmless from any claims for unauthorized payments or debits that result from, and could have been avoided but for, Client's rejection of the Positive Pay & ACH Positive Pay/Block Service.
Remote Deposit Service
Allow deposits into personal account(s) (Personal accounts must be those of the business owner(s) ONLY)  *Each closed batch is considered one (1) deposit.
Automated Sweep Service (check all that apply):
Automatic Sweep Target Balance:  Master Deposit Account No.:
Target Balance (If applicable):
Deposit Sub-Accounts
"Sub-Account A" No.:
Target Balance (if applicable):
"Sub-Account B" No.:
Target Balance (if applicable):
"Sub-Account C" No.:
Target Balance (if applicable):
Interest Bearing Sweep Account No. (if applicable):
Automated Line of Credit Sweep Balances:
Primary Account No.:
Maximum Balance:
Minimum Balance:
Incremental Amount:
Interest Bearing Account No.:
Line of Credit Account No :

	Automated ZBA Sweep:	
	Zero Balance Account No.:	Primary Account No.:
	Zero Balance Account No.:	Primary Account No.:
$\checkmark$	Multiple Party Access Service	
	Each Client: (i) acknowledges the "List of Clients (his/her) current and future deposit and loan account expressly understands that the "Accounts" accessing Description will also include the Accounts of each	ble pursuant to the Multiple Party Access Service
	Lockbox Service	
	Lockbox Account:	
	Acceptable Payee Variation(s):	
	Address for Remittance Materials:	
[	Business Associate Supplement to Lockbox Service	ce
	Client Privacy Officer Name and Contact Inform-	ation:
	Courier Service	
	Night Drop Service	
	Day Drop Service	
	Cash Deposit and Vault Service	

## SCHEDULE A TO ACCEPTANCE OF TREASURY MANAGEMENT SERVICES

#### SECURITY PROCEDURES

New Schedule A	Amendment No to existing Schedule A, dated:
	(Amended version effective as of date initialed by Bank, below)
	✓ N/A

Subject to the terms of the Master Treasury Management Services Agreement, Wire Transfer Service Description, Online Banking Service Description, and related Service Descriptions, as applicable (collectively "Master Agreement"), Client may initiate and originate wire transfer requests (referred to as "Payment Orders") in accordance with the below Security Procedures. This Schedule A may be amended by completing and providing to Bank a revised Schedule A which has been executed by Client. Bank may rely on the most current Schedule A in its records until Bank receives an amended Schedule A executed by Client and Bank has had a reasonable time to act thereon (after which time Bank shall rely upon the change).

By executing this Schedule A, Client agrees that the Security Procedures are commercially reasonable for Client and that Client will be bound by Payment Orders in Client's name as set forth in the Master Agreement. This Schedule A forms part of the Acceptance of Treasury Management Services agreed to by Client. In the event of conflicts between the terms of this Schedule A and the terms of the Master Agreement, the terms of this Schedule A shall control. Defined terms in this Schedule A shall have the meaning provided in the Master Agreement, unless otherwise defined in this Schedule A.

- Payment Order. Subject to the terms of the Master Agreement, and unless otherwise communicated by Bank to
  Client in writing, Client may submit a Payment Order in accordance with this Schedule A, via Bank's Online
  Banking Service. Payment Orders are subject to the limits established by Bank for Client from time to time. Any
  request by Client for a change or increase in a Payment Order limit, whether temporary or otherwise, shall be
  subject to Bank's prior approval which approval shall be provided in Bank's sole discretion.
- Authorized Agents. The following are Authorized Agents permitted to transmit Payment Orders to Bank. The
  Authorized Agents of Client may be amended from time to time by Client submitting an executed Amended
  Schedule A to Bank or in another manner as may be permitted by Bank in its sole discretion.

Name of Authorized Agent	Phone Number	Email

- Initial Security Procedures. The below Initial Security Procedures will depend on Client being authorized under the Master Agreement to submit a Payment Order to Bank using the applicable method. Only Authorized Users with sufficient entitlements may initiate and approve Payment Orders.
  - (a) Online Banking Payment Orders. The following Security Procedures must be followed for all Payment Orders transmitted through the Online Banking Service.

<u>User ID/Password</u>: Authorized Users must access the Online Banking Services with their designated User ID and User Password. Client agrees that the User ID's and User Passwords will remain secure and are not to be shared amongst the employees or any third parties, including amongst Authorized Users.

Security Token: To send Payment Orders through the Online Banking Service, the Authorized User must use a Security Token provided, required, or approved by Bank. Security Tokens provide an additional layer of security by generating a unique, one-time, time-sensitive (typically 30 seconds) security code. Security Tokens may be issued as physical, virtual (mobile) or desktop tokens and are assigned to an Authorized User, whose responsibility it is to keep in a secure location and to ensure it is not used by other individuals. Each Authorized User accessing the System and submitting a Payment Order will be required to enter the unique security code generated by the Security Token.

- 4. Supplemental Security Procedures Call-Back Verification: Subject to Paragraph 4(a) below, in addition to the Default Security Procedures under Section 3, Payment Orders will be authenticated using the Single Control Security Procedures identified in Paragraph (a) below, to the extent applicable. Client agrees that the Single Control Security Procedures in Paragraph (a) as applicable, are commercially reasonable for the size, type and frequency of Payment Orders normally issued by Client after considering all of the Security Procedures in this Schedule A.
  - (a) <u>Single Control Security Procedure</u>: The Single Control Security Procedure will be used for the following Payment Order methods utilized by Client:
    - Online Banking Payment Orders in the amount of \$25,000 or more, or such other limits as may be established by Bank for Client from time to time.

Each Payment Order will be authenticated by Bank with a telephone call to one of the Authorized Agents at the telephone number listed in Paragraph 2 above or a telephone number maintained by Bank for Client. The call to the Authorized Agent may include the Authorized Agent who is purported to have submitted the Payment Order. Bank is only required to make one attempt to contact an Authorized Agent. If Bank calls the Client and is unable to speak to an Authorized Agent or authenticate the Authorized Agent and the Payment Order in accordance with this Security Procedure, Bank retains the option not to process the Payment Order.

(b) <u>Authentication</u>: In connection with the call backs listed in Paragraph (a) above, Bank will authenticate the identity of the Authorized Agent by requiring the Authorized Agent to provide Bank with the last six (6) digits of the serial number located on the back of the security token provided by Bank. After authenticating the identity of the Authorized Agent, Bank will also confirm the amount of the Payment Order and the name of the beneficiary.

5. Automatically Commercially Reasonable: Client agrees and acknowledges Bank will authenticate Payment Orders given in Client's name using the Single Control Security Procedure under Sections 3 and 4(a) above for the Payment Orders and such authentication will be deemed automatically commercially reasonable for the size, type and frequency of Payment Orders normally issued by Client after considering the Security Procedures under Sections 3 and 4(a). Client further agrees to be bound by any Payment Orders submitted to Bank using the Single Control Security Procedure under Sections 3 and 4(a), whether or not authorized, as requested and chosen herein by Client. Client causes this new or amended Schedule A to be executed by its duly authorized officer(s). Client: ☐ IF CHECKED, REFER TO "SCHEDULE B - COMMON OWNERSHIP CLIENTS" FOR A LIST OF COMMONLY OWNED CLIENTS AND THEIR RESPECTIVE ACCOUNTS SUBJECT TO THE TREASURY MANAGEMENT TERMS, INCLUDING THIS SCHEDULE A. [Signature]: N/A Name: N/A Title: N/A Date: N/A Accepted and authorized by Valley Republic Bank: [Signature] Name: N/A Title: N/A

Date: N/A

# SCHEDULE B TO ACCEPTANCE OF TREASURY MANAGEMENT SERVICES

#### COMMON OWNERSHIP CLIENTS

List of Chents:	
Client Name: North Kern Water Storage District	Commercial Account Consumer Account*
Client Name: Kern Groundwater Authority	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*
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Client Name:	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*
Client Name:	Commercial Account Consumer Account*

<sup>\*</sup>As a Client of a consumer account, I acknowledge receipt of and I am also agreeing to the terms of the Master Agreement, the Online Banking Service Description, including applicable exhibits and addendums thereto.

#### Part III - Additional Terms and Signatures

Title:

Any Client initiated addition, deletion or change to the Acceptance for any Service must be submitted in a form acceptable to Bank, and no such requested addition, deletion or change will become operative or effective until Bank confirms to Client that such addition, deletion or change has been approved by Bank and implemented. Notwithstanding the foregoing, Bank reserves the right to delete, change or add to this Acceptance upon notice to Client.

The Acceptance may be signed in counterparts and transmitted by facsimile. If signed in two or more counterparts, each will be deemed an original, but such counterparts will constitute one instrument. The effectiveness of the Acceptance (or any related document) and any signatures shall, to the extent permitted by applicable law, have the same force and effect as manually-signed originals and shall be binding on all parties hereto. Bank may also require that the Acceptance (or any related document) be confirmed by a manually-signed original thereof; provided, however, that the failure to request or deliver the same shall not limit the effectiveness of any facsimile document or signature.

WITH THE EXCEPTION OF THE MULTIPLE PARTY ACCESS SERVICE DESCRIPTION WHICH (IF SELECTED ABOVE) IS AGREED TO JOINTLY AND SEVERALLY BETWEEN EACH CLIENT IN SCHEDULE B, EACH CLIENT SEPARATELY AGREES TO THE TERMS OF THIS ACCEPTANCE WITH BANK.

SCHEDULE B, EACH CLIENT SEPARATE WITH BANK.	LY AGREES TO THE TERMS OF THIS ACCEP
Agreed To and Accepted	("Effective Date")
CLIENT	
	APPOINTED REPRESENTATIVE, AGREED TO FEACH CLIENT LISTED UNDER "LIST OF CEPTANCE.
By:	
Name: Kevin S. Andrew	
Title: President	
VALLEY REPUBLIC BANK	
By:	
Name:	

#### VALLEY REPUBLIC BANK RESOLUTIONS FOR

#### ACCEPTANCE OF TREASURY MANAGEMENT SERVICES

North Kern Water Storage District	("Client")
-----------------------------------	------------

I/we, the undersigned ("Undersigned"), hereby certify to Valley Republic Bank ("Bank") that the undersigned am/ are the individual owner of the sole proprietorship, or the secretary of the corporation, or the duly authorized general partners(s), or the duly authorized member(s) (if management is by the member or members), or the duly authorized manager(s) (if management is by the manager or managers), or the duly authorized representatives of the governing body of the Client, and designated keeper of the records and minutes of the Client;

WHEREAS, the following is a true and correct copy of Client Resolutions duly adopted by the Board of Directors (if a corporation), the partners (if a partnership), members/managers (if a limited liability Client), proprietor (if a sole proprietorship) or other governing authority of the Client at a meeting held on the 07 day of March 2016, at which a quorum was present and acting throughout, or adopted by the written consent of a majority of those entitled or required to act to bind the Client, and that such Client Resolutions are in full force and effect and have not been amended, modified or repealed;

WHEREAS, the Client has reviewed and approved Bank's Acceptance of Treasury Management Services, pursuant to which the Client agrees to be bound by Bank's Master Treasury Management Services Agreement, together with each applicable Service Description, including any Supporting Documents, corresponding exhibits, schedules or attachments to the same, which apply to the services designated by Client in the Acceptance (collectively referred to herein as the "Acceptance") to be entered into by and between the Client and Bank;

WHEREAS, defined terms in this document shall have the meaning provided in the Acceptance, unless otherwise provided herein; and

WHEREAS, the Client has determined that it is in the best interests of the Client to enter into the Acceptance in connection with the Services and subject to the terms and conditions of the Acceptance, as amended from time to time.

#### NOW, THEREFORE, BE IT RESOLVED AS FOLLOWS:

- (a) The Client finds that it is in the best interest of the Client to enter into the Acceptance, as amended from time to time;
- (b) The Client authorizes and appoints each of the officers of the Client and any authorized signer on the Accounts, acting individually or together, to execute and deliver the Acceptance;
- (c) Any one or more of the foregoing persons are authorized to negotiate terms and conditions of the Acceptance, amendments or supplements to the Acceptance, and to enter into such other agreements, supplements and amendments as they individually or jointly determine to be appropriate, including amendments or supplements; and
- (d) The authority given above will continue, and the Bank may rely on the actions of any person referred to above, until such time as the Bank is given formal written notice of the revocation of such authority and the Bank has an opportunity to respond to the same. All acts and deeds taken by any person referred to above shall be deemed the act and deed of the Client for all purposes relating to the Acceptance and to all services described in the Acceptance or provided by the Bank to the Client under the Acceptance.

The Undersigned hereby certifies under penalty of perjury under the laws of the state of California that the forgoing resolutions were duly and legally adopted by the governing body of the Client and that said Resolutions have not been revoked and are currently in full force and effect:

/x/	/x/
Date:	Date:
Title: President	Title: Secretary/Treasuer
Print Name: Kevin S. Andrew	Print Name: Carole A. Fornoff

#### VALLEY REPUBLIC BANK RESOLUTIONS FOR

#### ACCEPTANCE OF TREASURY MANAGEMENT SERVICES

Kern Groundwater Authority	("Client")
----------------------------	------------

I/we, the undersigned ("Undersigned"), hereby certify to Valley Republic Bank ("Bank") that the undersigned am/ are the individual owner of the sole proprietorship, or the secretary of the corporation, or the duly authorized general partners(s), or the duly authorized member(s) (if management is by the member or members), or the duly authorized manager(s) (if management is by the manager or managers), or the duly authorized representatives of the governing body of the Client, and designated keeper of the records and minutes of the Client;

WHEREAS, the following is a true and correct copy of Client Resolutions duly adopted by the Board of Directors (if a corporation), the partners (if a partnership), members/managers (if a limited liability Client), proprietor (if a sole proprietorship) or other governing authority of the Client at a meeting held on the 23 day of March 20 17, at which a quorum was present and acting throughout, or adopted by the written consent of a majority of those entitled or required to act to bind the Client, and that such Client Resolutions are in full force and effect and have not been amended, modified or repealed;

WHEREAS, the Client has reviewed and approved Bank's Acceptance of Treasury Management Services, pursuant to which the Client agrees to be bound by Bank's Master Treasury Management Services Agreement, together with each applicable Service Description, including any Supporting Documents, corresponding exhibits, schedules or attachments to the same, which apply to the services designated by Client in the Acceptance (collectively referred to herein as the "Acceptance") to be entered into by and between the Client and Bank;

WHEREAS, defined terms in this document shall have the meaning provided in the Acceptance, unless otherwise provided herein; and

WHEREAS, the Client has determined that it is in the best interests of the Client to enter into the Acceptance in connection with the Services and subject to the terms and conditions of the Acceptance, as amended from time to time.

#### NOW, THEREFORE, BE IT RESOLVED AS FOLLOWS:

- (a) The Client finds that it is in the best interest of the Client to enter into the Acceptance, as amended from time to time;
- (b) The Client authorizes and appoints each of the officers of the Client and any authorized signer on the Accounts, acting individually or together, to execute and deliver the Acceptance;
- (c) Any one or more of the foregoing persons are authorized to negotiate terms and conditions of the Acceptance, amendments or supplements to the Acceptance, and to enter into such other agreements, supplements and amendments as they individually or jointly determine to be appropriate, including amendments or supplements; and
- (d) The authority given above will continue, and the Bank may rely on the actions of any person referred to above, until such time as the Bank is given formal written notice of the revocation of such authority and the Bank has an opportunity to respond to the same. All acts and deeds taken by any person referred to above shall be deemed the act and deed of the Client for all purposes relating to the Acceptance and to all services described in the Acceptance or provided by the Bank to the Client under the Acceptance.

The Undersigned hereby certifies under penalty of perjury under the laws of the state of California that the forgoing resolutions were duly and legally adopted by the governing body of the Client and that said Resolutions have not been revoked and are currently in full force and effect:

/x/	/x/
Date:	Date:
Title: President	Title: Secretary/Treasurer
Print Name: Kevin S. Andrew	Print Name: Carole A. Fornoff

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 6A

P.O. Box 81435 Bakersfield, CA 93380-1435 Administration

Telephone: 661-393-2696 Facsimile: 661-393-6884



33380 Cawelo Avenue Bakersfield, CA 93308-9575 Water Orders and Operations Telephone: 661-393-3361 www.northkernwsd.com

## NORTH KERN WATER STORAGE DISTRICT

June 15, 2021

TO: ENGINEERING COMMITTEE

Directors Ackerknecht and Camarena, Alternate Andrew

FROM: Ram Venkatesan

RE: Award of Contract to Water Associates for the Water Meter Installation NK-617

Project

#### RECOMMENDED MOTION:

"Authorize the General Manager to award a contract to Water Associates for the Water Meter Installation NK-617 project in an amount not-to-exceed \$350,000."

#### DISCUSSION:

As indicated at prior Board meetings, the District was successful in getting grant funding from the Bureau of Reclamation ("Bureau") (\$3.0 million) under the 2019 and 2020 WaterSMART Water and Energy Efficiency grant program to concrete line the Calloway Canal from Snow Road to 7<sup>th</sup> Standard Road and implement Phase III of the Water Delivery Improvements project ("WDI"). Phase III of the WDI includes installation of water meters, groundwater level sensors, and power usage measurement devices at 30 District well sites and canal water level sensors at 15 locations and the necessary instrumentation to transmit data to the District office.

Consistent with the methodology that was followed in the previous phase (Phase II – Instrumented 54 wells and 17 canal level sensor locations), for better pricing staff directed GEI Consultants to split the Phase III WDI project in three parts (PLC-NK-616, Water Meter-NK-617 and Electrical-NK-618). Also, the Bureau of Reclamation authorized the District to enter into contracts with the contractors that implemented Phase II of the WDI project for better continuity between the phases of implementation, ensuring the transition between the phases is seamless due to contractor's expertise on the project.

At the May meeting, the Board authorized staff to award a contract to South Coast Controls ("SCC") for the PLC NK-616 project if the proposed cost for the project was under \$550,000. The District received the formal proposal from SCC and the estimated budget to complete NK 616 project is \$480,000. Based on the authorization received at the May meeting, staff awarded the contract for NK-616 project to SCC.

Engineering Committee Award of Contract to Water Associates for the Water Meter Installation NK-617 Project June 15, 2021 Page 2 of 2

The Request for Proposal for NK-617 is due back from Water Associates ("WA") on or before June 29<sup>th</sup>, 2021 (after the June Board meeting). The engineers estimate for NK-617 project is \$350,000 (includes 10% contingency).

Staff recommends Board approval to authorize the General Manger to award a contract to Water Associates for the NK-617 project in an amount not-to-exceed \$350,000 subject to legal counsel approval. If the proposal exceeds the recommended authorization, staff will bring the proposal to the Board with an appropriate recommendation.

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 6B

P.O. Box 81435 Bakersfield, CA 93380-1435 Administration

Telephone: 661-393-2696 Facsimile: 661-393-6884



33380 Cawelo Avenue Bakersfield, CA 93308-9575 Water Orders and Operations Telephone: 661-393-3361 www.northkernwsd.com

## NORTH KERN WATER STORAGE DISTRICT

June 15, 2021

TO: ENGINEERING COMMITTEE

Directors Ackerknecht and Camarena, Alternate Andrew

FROM: Ram Venkatesan

RE: Award of Contract for Instrumentation and Control Services for Phase III of the

Water Delivery Improvement Project

#### RECOMMENDED MOTION:

"Authorize the General Manager to enter into an agreement with ProUsys for Instrumentation and Control services for the Phase III of the Water Delivery Improvement project for a budget amount not-to-exceed \$193,900."

#### DISCUSSION:

As indicated at prior Board meetings, the District was successful in getting grant funding from the Bureau of Reclamation ("Bureau") (\$3.0 million) under the 2019 WaterSMART Water and Energy Efficiency grant program to concrete line the Calloway Canal from Snow Road to 7<sup>th</sup> Standard Road and implement Phase III of the Water Delivery Improvements project ("WDI"). Phase III of the WDI includes installation of water meters, groundwater level sensors, and power usage measurement devices at 25 District well sites and canal water level sensors at 17 locations and the necessary instrumentation to transmit data to the District office.

At the April 16, 2019 meeting, the Board authorized staff to enter into an agreement with ProUsys for design, bid specification, and Instrumentation and Control ("I&C") services for the Phase II of the WDI project (54 well sites and 17 canal level sensor locations). ProUsys successfully completed implementing Phase II of the WDI project and did a presentation to the Board at the November 2020 Board Meeting. Staff requested a proposal (Exhibit "A") from ProUsys for Instrumentation and Control ("I&C") services for Phase III of the WDI project. I&C services that ProUsys will provide includes programming the Programmable Logic Controller ("PLC"), programming the SCADA software to receive the data from all the sites, field testing the PLC panel at the contractor's location, providing construction management support and programming the reporting software to generate necessary water and power usage reports. ProUsys has provided a budget of \$193,900 to provide the necessary support for the project. Staff reviewed the proposal for scope and fee and finds them acceptable.

Engineering Committee
Award of Contract for Instrumentation and Control Services for Phase III of the Water Delivery
Improvement Project
June 15, 2021
Page 2 of 2

Staff recommends Board approval for the General Manager to enter into an agreement with ProUsys for Instrumentation and Control services for the Phase III of the WDI project for a budget amount not-to-exceed \$193,900. Grant funds are expected to cover a significant portion of this amount.

Attachments:

Exhibit "A" – Cost Estimate from ProUsys

June 03, 2021

North Kern Water Storage District 33380 Cawelo Avenue Bakersfield, Ca 93308 Attention: Ram Venkatesan

RE: NKWSD SCADA Upgrade Ph-3 SCADA Phase Quote

**Prousys, Inc.** is pleased to provide you with the subject proposal for instrumentation and controls services.

#### Scope

Prousys will provide the following labor and services for the following items:

Item	Qty	Description
1	LS	Services to include:
	LS	Well PLC Programming SCADA Wonderware system Platform Programming XL reports/Testing of Reports Data /Deployment Master PLC Radio communication and programming setup FAT of panels/ Site visit to Southwest LA/ Travel Time Win 911 call out system Dell SCADA server/ client's configuration and software download/ setting up Radio programming Startup / field loop test RTU PLC programming RTU startup / loop test Instrumentation setting/Programming (well Level) Instrumentation setting/Programming (well Flowmeters) Instrumentation setting/Programming (Canal Level)
		SCADA Screens Submittals Programming Power Monitor
		Training Staff on SCADA system Operations
		Misc Meeting/Project management

**Total Cost for Items #1** 

\$ 193,900.00

#### Clarifications / Exclusions

- No work shall begin until an Executed Contract and an agreed upon Payment Schedule is in place
- No Hardware and Software is included.
- Installation by Others
- Bonding is not included

Corporate Office:





Stand-by time and External Troubleshooting is not included in the Scope of Work and will be invoiced at the published rates. Stand-by time is defined as time spent on-site waiting for accessibility to the items included in the scope of work. This includes, but is not limited to, other delays beyond the control of and not contracted to Prousys, Inc. External troubleshooting is related to electrical or mechanical equipment outside of the items included in the scope of work or problems caused by external sources and/or influence.

Quotation is valid for 30 days

We appreciate the opportunity to bid this work. If you have any questions please contact Kunal Bakshi at (661) 654 1459.

Cc: Prousys, Inc. - Kunal Bakshi





#### **General Terms and Conditions**

The attached proposal made by Prousys, Inc. ("Prousys") to ("Client") for instrumentation and controls services is subject to the below terms and conditions ("Terms and Conditions"). The attached proposal, together with the Terms and Conditions and any related purchase orders and change orders accepted by Prousys, are collectively referred to herein as the "Contract."

#### 1. Billings and Terms of Payment

Monthly billings will be on a percent complete basis for labor expended and material received plus a projection of costs to the end of the month. Retention of 5% will be billed at the point of substantial completion of Prousys' portion of the work. All amounts are due net thirty (30) days. All payments thirty (30) days in arrears are subject to a finance charge of 2% per month on the outstanding balance. All merchandise sold is subject to lien laws. Prousys price is FOB factory.

#### 2. Escalation

Prousys reserves the right to pass on to Client any increase in price from suppliers during the term of the Contract.

#### 3. Warranty

Prousys warrants all equipment manufactured by Prousys to be free from defects in material and workmanship under normal use and service for a period of twelve (12) months from date of shipment. All parts or products not manufactured by Prousys will be covered only by the express warranty, if any, of the manufacturer. Prousys' above- described limited warranty does not extend to damage or wear caused by misuse, negligence, accident, corrosion, modification by Client, faulty installation, loss of product, or tampering in a manner to impair normal operation of the equipment. ProUsys reserves the ultimate right to determine implicitly or explicitly what is or is not covered by Warranty.

#### 4. Insurance

Prousys carries the following insurance.

Workmen's Compensation at the state required level

General Liability Each Occurrence	\$1,000,000
Personal & Adv injury	\$1,000,000
Products Aggregate	\$1,000,000
General Aggregate	\$2,000,000
Automobile	\$1,000,000
Excess Liability	\$4,000,000
Professional Liability Each Occurrence	\$1,000,000
Aggregate	\$1,000,000
	. , ,

#### 5. Non-Solicitation of Employees

Notwithstanding any other provision of the Contract, Client shall not, directly or indirectly, employ, solicit for employment, or advise or recommend to any other person that such other person employ or solicit for employment, any person employed or under contract to perform services for or on behalf of Prousys (whether as a consultant, employee or otherwise), at anytime during the term of the Contract and for twelve (12) months following the earlier of the expiration or termination of the Contract or the termination of such person's employment or contract with Prousys.

#### 6. Intellectual Property

Prousys shall retain all right, title and interest in all Intellectual Property (as defined herein) used, made or arising in connection with the Contract or otherwise provided or communicated to Client by or on behalf of Prousys. Without limiting the foregoing, Client shall not use any drawings or specifications prepared by Prousys, except for the purpose of confirming the quality of design and manufacturing of the products set forth in the attached proposal; and Client shall not photocopy, duplicate or in any way reproduce in whole or in part any drawings, specifications, or software which may be supplied by Prousys; provided, however, that the Client may make copies of and use such software for Client's internal purposes only, and not for rendering services or selling products to third persons. The Client shall not sell, license, sublicense, assign

Corporate Office:



or otherwise transfer the Intellectual Property or any interest therein to anyone. As used herein, "Intellectual Property" means and includes any and all software, specifications, designs, processes, techniques, concepts, improvements, discoveries, ideas, and inventions, whether or not patentable, and all patents, copyrights, trade secrets and other intellectual property rights therein or related thereto.

#### 7. Ownership of Software

Title to the application software provided to Client by Prousys under the Contract remains with Prousys, and Client is subject to any third party licenses. Prousys grants to the Client a personal, paid-up, perpetual, nonexclusive, non-assignable and non-transferable license, without right of sub-license, to use said application software in the application for which the software was designed in conjunction with the specified equipment.

#### 8. Limits of Liability

IN NO EVENT, REGARDLESS OF CAUSE, SHALL PROUSYS ASSUME RESPONSIBILITY FOR OR BE LIABLE (A) UNDER ANY PENALTY CLAUSE OF FOR PENALTIES OF ANY DESCRIPTION, (B) FOR INDEMNIFICATION OF CLIENT OR OTHERS FOR COSTS, DAMAGES, OR EXPENSES ARISING OUT OF OR RELATED TO THE GOODS OR SERVICES PROVIDED UNDER THE CONTRACT OR FOR CERTIFICATION UNLESS OTHERWISE SPECIFICALLY PROVIDED HEREIN, OR (C) FOR ANY LOSS OF PROFITS, LOSS OF USE. BUSINESS INTERRUPTION, LOSS OF DATA, OR INDIRECT, INCIDENTAL, SPECIAL, OR CONSEQUENTIAL DAMAGES OF ANY KIND IN CONNECTION WITH OR ARISING OUT OF THE FURNISHING, PERFORMANCE, OR USE OF THE GOODS OR SERVICES PROVIDED. TO CLIENT, INCLUDING RELATED DOCUMENTATION, OR ARISING FROM DELAY IN DELIVERY OR FURNISHING OF ANY SERVICES OR PRODUCTS, WHETHER ALLEGED AS A BREACH OF CONTRACT, OR TORTIOUS CONDUCT, INCLUDING NEGLIGENCE, OR OTHERWISE, EVEN IF PROUSYS HAS BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES. FURTHERMORE, PROUSYS'S LIABILITY ARISING OUT OF OR RELATED TO THE CONTRACT, INCLUDING FOR DIRECT DAMAGES, SHALL NOT EXCEED THE PURCHASE PRICE STATED IN THE ATTACHED PROPOSAL. THIS LIMITATION OF LIABILITY IS CUMULATIVE, WITH ALL PAYMENTS FOR CLAIMS OR DAMAGES IN CONNECTION WITH THE CONTRACT BEING AGGREGATED TO DETERMINE SATISFACTION OF THE LIMIT, SUCH THAT THE EXISTENCE OF ONE OR MORE CLAIMS WILL NOT ENLARGE THE LIMIT. IN ADDITION, THIS LIMITATION OF LIABILITY WILL APPLY REGARDLESS OF THE FORM OF ACTION, WHETHER IN CONTRACT OR TORT, INCLUDING NEGLIGENCE.

#### 9. Termination of Contract

Cancellations or stop-work requests by Client on any order or part thereof, must be made in writing. Notwithstanding any such request, Client agrees to pay Prousys' standard contract labor rate for all labor incurred, and Prousys' net material costs for all materials purchased for that order, including any restocking charges incurred.

#### 10. Delays

## ACCELERATED/ DECELERATED PACE OF PROJECT EXECUTION: FAST TRACK:

Client acknowledges that if Client requires a Systems Integrator (as defined below) to perform on an accelerated schedule (i.e. pace faster than the Systems Integrator's normal business procedure as dictated by the Systems Integrator's standard business practices), the risk of errors in the design and development of hardware and software increases as do certain costs such as but not limited to, express shipping of incoming purchases to the Systems Integrator, charges for expedited manufacture, development and/or delivery of hardware and/or software to the Systems Integrator and, express shipping to Client by the Systems Integrator. Client agrees that upon Client's request to the Systems Integrator to perform on an accelerated basis, Client will compensate the Systems Integrator (at Systems Integrator's then prevailing rates) for the additional costs incurred and work required as a result of the accelerated pace of project execution.

SLOW TRACK:

#### Corporate Office:





A decelerated pace of project execution also causes additional work and costs. If Client decelerates the pace of project execution, Client shall bear the additional costs and expenses associated with such deceleration including but not limited to paying the Systems Integrator for "spin-up" time (inefficiency caused by starting and stopping) at the System Integrator's then prevailing rates. As used herein, "System Integrator" refers to any person or entity responsible for integrating software, hardware or other materials or equipment provided by Prousys into Client's computer network or other system(s).

#### 11. Changes in Scope

Changes to work that are considered by Prousys to be beyond the scope of the present Contract will be addressed by Prousys describing to the Client in writing Prousys' understanding and assessment of the complete scope, cost, and schedule impact of the desired changes. Prousys will only take action on the requested changes when the Client has responded in writing that he/she/it agrees with the scope, cost, and schedule impacts.

#### 12. Confidentiality

Any information, suggestions, or ideas transmitted by Client to Prousys in connection with performance hereunder are not to be regarded as secret or submitted in confidence except as may be otherwise provided in writing by Client and signed by a duly authorized representative of Prousys.

#### 13. Dispute Resolution

It is agreed that any dispute arising under the Contract, including without limitation disputes relating to interpretation of the Contract terms or the performance, negligent performance or nonperformance of the Contract or any part thereof, will be determined by submission to binding arbitration in accordance with the California Arbitration Act (California Code of Civil Procedure ["CCP"] sections 1280 – 1294.2) or any successor statute then in effect. Any such arbitration shall be held and conducted in Bakersfield, California, before one (1) neutral arbitrator who shall be selected by mutual agreement of the parties; provided, however, if agreement is not reached on the selection of an arbitrator within fifteen (15) days of a party's written demand for arbitration, then such arbitrator shall be appointed by the presiding judge of the Kern County Super Court in accordance with CCP section 1281.6. The discovery provisions of CCP section 1283.05 shall apply in the arbitration proceeding. The arbitrator's decision shall be based on California law. The arbitrator's decision may include monetary and/or equitable relief. The cost and fees of the arbitrator shall be borne by the non-prevailing party. In addition, the prevailing party shall be awarded reasonable attorney fees, witness costs and expenses, and other costs and expenses incurred in connection with the arbitration. ALL PARTIES TO THE CONTRACT, BY ENTERING INTO IT, ARE GIVING UP THEIR CONSTITUTIONAL RIGHT TO HAVE ANY SUCH DISPUTE DECIDED IN A COURT OF LAW BEFORE A JURY, AND INSTEAD ARE ACCEPTING THE USE OF ARBITRATION AS THEIR EXCLUSIVE REMEDY.

#### 14. Governing Law

The Contract is governed in all respects by the laws of the State of California, without reference to any of its choice of law rules that would require the application of the law of any other jurisdiction.

#### 15. Attorney Fees

If any proceeding or lawsuit is brought by either party hereto against the other relating to any dispute arising out of or relating to the Contract or the subject matter thereof, the prevailing party in such proceeding or lawsuit shall be entitled to receive, in addition to any other relief that may be awarded, its costs of suit, expert witness fees and reasonable attorneys' fees of outside counsel, including costs and fees on any appeal.

#### 16. Limits of Actions

Except for any action by Prousys against Client for non-payment of the purchase price or other amounts owed to Prousys pursuant to the Contract (including any amendments and/or modifications hereto), any action for breach of the Contract must be commenced within one (1) year after the cause of action accrues, and no such action that is not commenced within such period may be maintained.

#### 17. Storage of Materials on Site

Corporate Office:





Materials stored on site to be installed by others are to be considered delivered to the site owner's care and custody. Materials stored on site to be installed by the Systems Integrator are to be considered in the care and custody of the Systems Integrator but are considered to be billable for progress billing in accordance with the progress billing procedures outlined in the Contract terms and conditions.

#### 18. Taxes

The Client is responsible for all taxes.

#### 19. Returns

All products and services described herein are sufficiently unique to prohibit any return for full or partial credit, other than under a warranty, unless specifically stated otherwise in the attached proposal. Prousys is not responsible for loss of or damage to products returned to it, unless notified in advance of the return and the Purchaser is given a Return Authorization Number which is prominently placed upon the shipping documents and packing container.

#### 20. Staffing

To allow us to be able to manage our participation in the project most effectively, Prousys reserves the right to determine the personnel to perform the work under the Contract although Prousys will attempt to honor the requests for specific individuals.

#### 21. Client's Obligations

At all times the Client is obligated to act in good faith and in a proper and appropriate manner including but not limited to working with Prousys to ensure Prousys' product performs as intended and if not, to clearly identify areas that require attention.

#### 22. Force Majeure

Prousys shall not be liable hereunder by reason of any failure or delay in the performance of its obligations hereunder on account of strikes, shortages, riots, insurrection, fires, flood, storm, explosions, acts of God, war, governmental action, civil disturbances, terrorist acts, labor conditions, earthquakes, material shortages or any other cause beyond the reasonable control of Prousys, in which case Prousys may terminate the Contract and have no liability thereunder.

#### 23. Severability

If any provision of the Contract is unenforceable or invalid under any applicable law or be so held by applicable judicial decision, such unenforceability or invalidity shall not render the Contract unenforceable or invalid as a whole. In such event, such provision shall be changed and interpreted so as to best accomplish the objectives of such unenforceable or invalid provision thin the limits of applicable law.

#### 24. Construction

The headings of sections of the Contract are for convenience only and are not to be used in interpreting the Contract. In the event of a conflict between any provision of these Terms and Conditions and the attached proposal or any related purchase order or change order, the provisions of these Terms and Conditions will control.

#### 25. Entire Agreement/Assignment

The Contract, including any related purchase order or change order subsequently accepted by Prousys in writing, completely and exclusively state the agreement of the parties regarding its subject matter. The Contract supersedes, and its terms govern, all prior proposals, agreements or other communications between the parties, oral or written, regarding such subject matter. Subsequent modifications of the Contract shall be in writing and signed by both parties. The Contract shall not be assigned by either party without prior written approval of the other part.



# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 6C

P.O. Box 81435 Bakersfield, CA 93380-1435 Administration

Telephone: 661-393-2696 Facsimile: 661-393-6884



33380 Cawelo Avenue Bakersfield, CA 93308-9575 Water Orders and Operations Telephone: 661-393-3361 www.northkernwsd.com

## NORTH KERN WATER STORAGE DISTRICT

June 15, 2021

TO: ENGINEERING COMMITTEE

Directors Ackerknecht and Camarena, Alternate Andrew

FROM: Ram Venkatesan

RE: CEQA Adoption for Califia Farms Recycled Water Project

#### RECOMMENDED MOTION:

"Adopt Resolution 21-xx Adopting "Initial Study/Negative Declaration for the North Kern Water Storage District, Califia Farms Recycled Water Project"; Approval of the "North Kern Water Storage District, Califia Farms Process Recycled Water Project"; Authorize District staff to file a Notice of Determination".

#### **DISCUSSION:**

Califia Farms ("Califia") operates a beverage production plant on the north side of Lerdo Highway approximately one-half mile east of Zerker Road. The District's Lerdo Canal is located south of and parallel to Lerdo Highway a short distance west of the Califia plant. In the fall of 2016, the District entered into an agreement with Califia to accept effluent discharges from Califia's beverage production plant. The Agreement (and the associated permit from the Regional Board) allows Califia to discharge up to 150,000 gallons per day (gpd) into the Lerdo Canal (except during District maintenance shutdown periods), with payments to North Kern including both nominal "fixed/admin" charges (\$30,000 per year) and variable charges tied to both the volume and water quality of the discharges (quality is weighted more heavily than volume).

Since Califia's discharge volumes were regularly exceeding the limits of the agreement (and the permit), in late 2019 District staff-initiated discussions with Califia on a potential amendment to the 2016 agreement and the permit. Califia proposed to increase the discharge up to 500,000 gpd into the Lerdo Canal and based on staff's discussion and economic analysis, it was decided that payments to North Kern will follow the same methodology as before that is weighted more heavily towards the quality of water. Staff and counsel are working on an amendment of the 2016 agreement.

Califia has submitted a Report of Waste Discharge to the Regional Board to amend the existing permit and included in the permit process is the preparation and processing of a CEQA Negative Declaration by North Kern. The District prepared the Initial Study/Negative Declaration ("IS/ND") (Exhibit "A") for the proposed project of increasing the discharge volume to 500,000

Engineering Committee CEQA Adoption for Califia Farms Recycled Water Project June 15, 2021 Page 2 of 2

gpd. As specified in the Resolution 21-xx (Exhibit "B"), and as required by CEQA a Notice of Intent was published in the Bakersfield Californian (Exhibit "C") and the District provided for at least a 30-day public comment period. In addition, copies of the Notice of Intent and IS/ND were provided to the State Clearinghouse and other public agencies.

The District received no comments on the IS/ND during the public review period.

Staff is requesting the Board adopt Resolution 21-xx and authorize staff to file a Notice of Determination (Exhibit "D").

#### Attachments:

Exhibit "A": Initial Study/Negative Declaration

Exhibit "B": Proposed Resolution

Exhibit "C": Notice of Intent

Exhibit "D": Notice of Determination



# **Draft Initial Study & Proposed Negative Declaration**

North Kern Water Storage District Califia Farms Recycled Water Project

Prepared for:

North Kern Water Storage District

April 2021



# Draft Initial Study & Proposed Negative Declaration North Kern Water Storage District Califia Farms Recycled Water Project

Prepared for: North Kern Water Storage District 33380 Cawelo Avenue Bakersfield, CA 93308

Contact:

Mr. Ram Venkatesan Deputy General Manager 661-393-2696



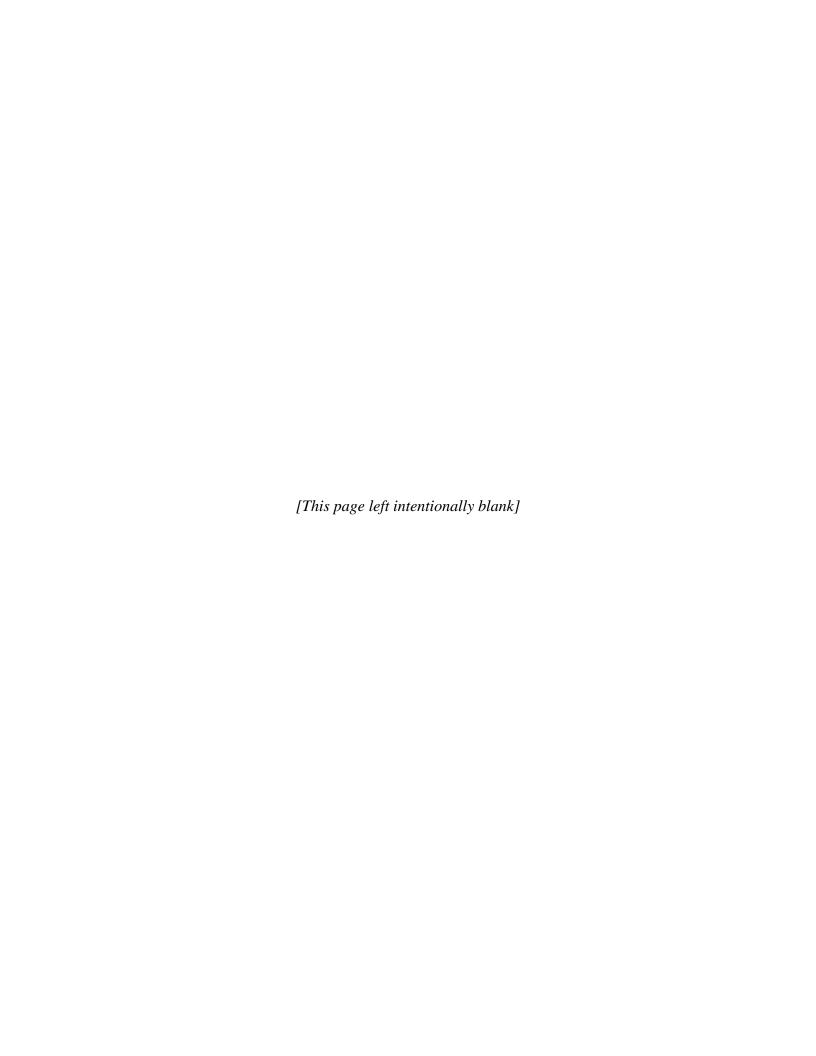
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April 26, 2021



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Appendix A - Project Site Photos

Appendix B - Report of Waste Discharge

# **Abbreviations and Acronyms**

AFY acre-feet per year AFD acre-feet per day

BPS Best Performance Standards

Caltrans California Department of Transportation

C.A.R.B. California Air Resource Boards

C.A.A.Q.S. California Ambient Air Quality Standards

CCR California Code of Regulations
CEC California Energy Commission
CEQA Californi Environmental Quality Act

CFS cubic feet per second

CGS California Geological Survey

C.O. carbon monoxide County Kern County

CRC California Resource Corporation

CRHR California Register of Historical Resources

District North Kern Water Storage District D.O.C. Department of Conservation

EC electrical conductivity

EIR Environmental Impact Report
EPA Environmental Protection Agency

FKC Friant Kern Canal
GEI GEI Consultants, Inc.
GHG greenhouse gas
gpd gallons per day

IS/ND Initial Study/Negative Declaration
N.A.A.Q.S. National Ambient Air Quality Standards

N.O.<sub>2</sub>. nitrogen dioxide NO<sub>X</sub> Oxides of nitrogen

NRHP National Register of Historic Places

O<sub>3</sub> Ozone

PG&E Pacific Gas and Electric

PM particulate matter

PM<sub>10</sub> particulate matter less than 10 microns in diameter PM<sub>2.5</sub> particulate matter less than 2.5 microns in diameter

ppm parts per million

PRC Public Resources Code

proposed Project Califia Farms Recycled Water Project RWQCB Regional Water Quality Control Board

S.J.V.A.B San Joaquin Valley Air Basin

S.J.V.A.P.C.D. San Joaquin Valley Air Pollution Control District

S.O.<sub>2</sub>. sulfur dioxide

S.M.A.R.A. Surface Mining and Reclamation Act of 1975

SPAL Small Project Analysis Level

SWRCB State Water Resource Control Board WDR Waste Discharge Requirements

# 1.0 Introduction

The North Kern Water Storage District (District) has prepared this Draft Initial Study/proposed Negative Declaration (IS/ND) in compliance with the California Environmental Quality Act (CEQA) and Guidelines to address the potentially significant environmental impacts of the proposed Califia Farms Recycled Water Project (proposed Project) in Kern County (County), California. The District is the lead agency under CEQA.

After the required public review of this document is complete, the District's Board of Directors will consider all IS/ND comments received, the entirety of the administrative record for the Project, whether to adopt the proposed ND and approve the proposed Project.

# 1.1 Summary

Chapter 3 of this document contains the analysis and discussion of potential environmental impacts of the proposed Project. Based on the issues evaluated in that chapter, it was determined that:

The proposed Project would result in no impacts on the following issue areas:

- Aesthetics
- Agriculture and Forestry Resources
- Biological Resources
- Cultural Resources
- Energy
- Hazards and Hazardous Waste
- Geology and Soils
- Greenhouse Gas Emissions
- Land Use and Planning
- Mineral Resources
- Noise
- Population and Housing
- Public Services
- Recreation
- Transportation
- Tribal Cultural Resources
- Utilities and Service System
- Wildfire

The proposed Project would result in less-than-significant impacts on the following issue areas:

- Air Quality
- Greenhouse Gas Emissions
- Hydrology and Water Quality

# 1.2 Other Key Public Agencies Relying on this IS/ND

CEQA requires that state and local governmental agencies consider the environmental effects of projects over which they have discretionary authority before taking action on those projects (Public Resources Code [PRC] Section 21000 et seq.). CEQA also requires that each lead agency avoid or mitigate to less-than-significant levels, wherever feasible, the significant environmental effects of projects it approves or implements. The Regional Water Quality Control Board (RWQCB) may rely on this IS/ND to issue Waste Discharge Requirements (WDR).

### 1.3 Document Organization

This document includes:

**Proposed Negative Declaration**. The ND, which precedes the presentation of the IS analysis in this document, briefly summarizes the proposed Project, summarizes the environmental conclusions.

**Initial Study.** The IS constitutes the remaining portion of this document and provides an introduction, Project description, environmental checklist, references cited, report preparers, and distribution list, as briefly summarized below:

**Chapter 1, Introduction.** This chapter describes the purpose of the IS/ND, summarizes conclusions, and describes the organization of this IS/ND.

**Chapter 2, Project Description.** This chapter describes the Project location and background, Project need and objectives, Project characteristics, construction activities, Project operations, and discretionary actions and approvals that may be required.

Chapter 3, Environmental Checklist. This chapter presents an analysis of environmental issues identified in the CEQA environmental checklist and determines whether Project implementation would result in no impact, less-than-significant impact, less-than-significant impact with mitigation incorporated, potentially significant impact, or significant impact on the physical environment in each topic area. Should any impacts be determined to be potentially significant or significant, an Environmental Impact Report (EIR) would be required. For the proposed Project, however, no significant impacts have been identified, so no mitigation measures have been incorporated.

**Chapter 4, References.** This chapter lists the references used to prepare this IS/ND.

**Chapter 5, Report Preparers.** This chapter identifies report preparers who contributed to the preparation of this document.

# 2.0 Project Description

#### 2.1 Introduction

Califia Farms, LLC (Califia Farms) proposes to increase their permitted daily maximum discharge volume to the Lerdo Canal or Rosedale Spreading Basins, both of which are owned and operated by the District. The Lerdo Canal is used to deliver water to irrigated agricultural uses, and to convey water for recharge to the District's groundwater spreading facilities.

Historically, water supplies transported in the Lerdo Canal were either from Kern River, the Friant-Kern Canal (FKC), or groundwater wells located within the District's service area. In 2015, the District implemented a drought relief project that partners with California Resource Corporation (CRC) to accept oilfield-produced water into the Lerdo Canal or Rosedale Spreading Basins. In 2016, Califia Farms' process water was also accepted with the expectation that they would reduce salinity in their process water.

# 2.2 Project Background

Califia Farms manufactures plant-based milks, yogurts, juices, and specialty coffee drinks from crops locally grown in the Central Valley. The Bakersfield manufacturing facility has been in operation since 2011 and is currently permitted to discharge 150,000 gallons per day (gpd), or 168 acre-feet per year (AFY). The permitted volume is increasing to a maximum of 500,000 gpd (or about 560 AFY). **Table 2-1** summarizes the permitted and proposed discharge volumes. Because Califia Farms has significantly reduced salinity in their discharge water, the District is willing to accept the increased volumes.

Table 2-1. Permitted and Proposed Discharge Volumes

	Discharge Volumes		
	GPD AFY		
Proposed	500,000	560	
Permitted	150,000	168	
Difference	350,000	392	

The District encompasses an area of approximately 60,000 acres. The District was formed in 1935 and subsequently formulated and adopted a conjunctive use project in 1950 to "build-up and maintain the groundwater storage underlying the district." This is accomplished through importing surface water from the Kern River and FKC as well as constructing facilities to manage available surface water supplies conjunctively with the underlying groundwater. The conjunctive use project maximizes beneficial use of available water supplies through both direct irrigation and groundwater recharge and relies on recovery of stored groundwater to supplement available surface water supplies in drier years. Irrigation water is conveyed primarily through unlined canals and laterals throughout the District, although the District's infrastructure does include some pipelines and lined canals. The system is operated to meet irrigation demands, where the peak irrigation season generally ranges from March through August and system demand is lower during the fall and winter months.

# 2.3 Proposed Project

The proposed Project is located at the Califia Farms Manufacturing Facility, 33502 Lerdo Highway, in Bakersfield, California, within the boundaries of Cawelo Water Storage District, in the San Joaquin Valley (**Figures 2-1 and 2-2**). The District's Rosedale Spreading Basins are located at the Calloway Canal and Zerker Road, approximately 2.3 miles southwest of the Califia Farms Manufacturing Facility. The proposed Project consists of recycling process water from Califia Farms by discharging into the Lerdo Canal where it blends with irrigation supplies managed by the District. The proposed Project is beneficial because it provides Califia Farms with a sustainable discharge solution and makes beneficial reuse of process water. Califia Farms' process water contains levels of electrical conductivity (EC) that exceeds state and regional discharge limits.

Water volumes in the Lerdo Canal fluctuate based on available water supplies and irrigation demand. On average, the Lerdo Canal moves approximately 109 cubic feet per second (CFS) per day of irrigation water, which is made up of surface water supplies, pumped-in groundwater, and produced water from CRC. Water volumes vary based on several factors, predominately irrigation demands, and available surface water supplies conveyed for groundwater recharge Califia is currently permitted to discharge a maximum of 0.2 CFS per day and proposes to increase their permitted capacity up to 0.8 CFS per day. Average volume for each source in Lerdo Canal were derived from the following data sources: 2020 Kern River Annual Hydrographic Reports, CRC Self-Monitoring Reports Discharge 001, and District records of groundwater conveyed via the 8-1 Canal into the Lerdo Canal. To simplify the analysis, 2020 records are used to represent the various water supplies conveyed in the Lerdo Canal.

Table 2-2. Volume of Water Supplies to the Lerdo Canal

Source	Average (CFS)
Kern River from 7 <sup>th</sup> Standard Weir	83
Groundwater from 8-1 Lateral	23
CRC (D001)	9.7
Groundwater from 2 adjacent wells	9.1
Califia (proposed volume)	0.8

Figure 2-1: Regional Location

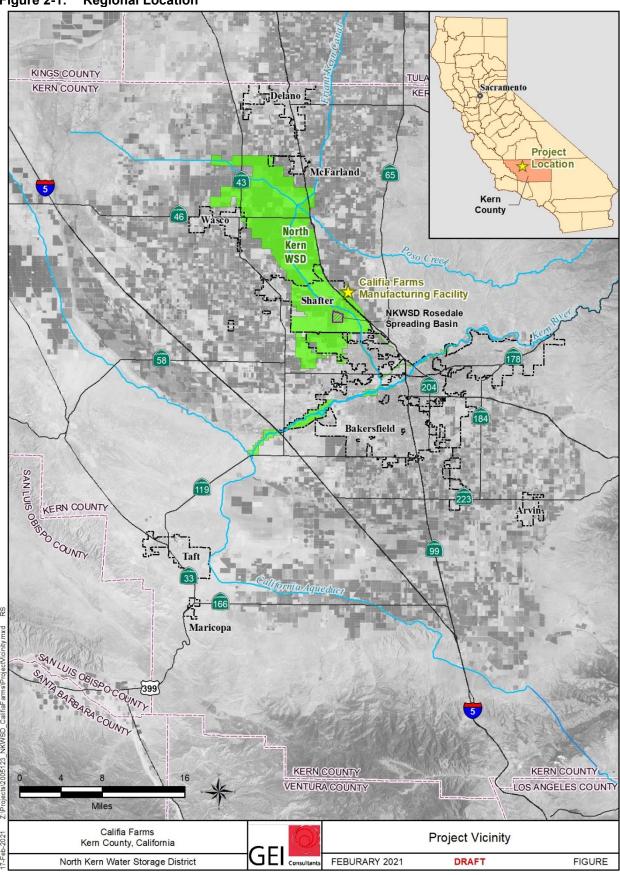
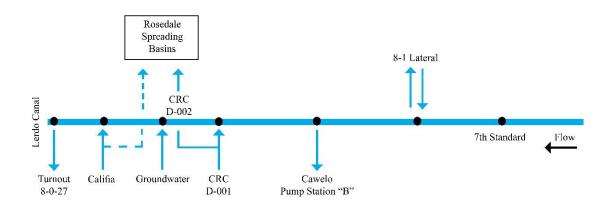


Figure 2-2: Project Location



**Figure 2-3** is a flow schematic of the District's Lerdo Canal. The Lerdo Canal receives Kern River water from 7<sup>th</sup> Standard Weir. Groundwater from wells located around the Rosedale Spreading Basins are conveyed into the Lerdo Canal via the 8-1 Lateral. Produced water from CRC is introduced downstream of the 8-1 lateral and Pump Station B. There are also two adjacent groundwater wells that pump directly into the Lerdo Canal. If the Lerdo Canal is shutdown, Califia Farms' water is discharged via truck (*see* dotted line in Figure 2-3) and blended with the District's water, if any, and CRC's produced water in the Rosedale Spreading Basins for groundwater recharge. This process is only carried out when required by the District, which is rare and intermittent.

Figure 2-3: Lerdo Canal Flow Schematic



While multiple water sources supply the Lerdo Canal prior to Califia's discharge point, they are grouped together and collectively described as Lerdo Canal to focus this report on impacts of Califia's discharge. Water quality samples are collected at the 7<sup>th</sup> Standard Weir, mass balance calculations are used to estimate water quality that represents blended water supplies that include the 8-1 Lateral, CRC, and the two adjacent groundwater wells. The Lerdo supplies and Califia Farms' discharge are used in the blending framework to evaluate impacts of Califia Farms' discharge and demonstrate that all District and Basin water quality thresholds are met at the first point of use (8-0-27 turnout).

# 2.4 Project Objectives

The proposed Project is beneficial because it provides Califia Farms with a sustainable discharge solution and makes beneficial reuse of process water. Since the Kern Subbasin is designated as a critically overdrafted basin, returning 560 AFY to the basin enables the water to be reused on the crops Califia Farms uses in their plant-based products.

# 2.5 Regulatory Requirements, Permits, and Approval

As the lead agency under CEQA, the District has the principal responsibility for approving and carrying out the proposed Project and for ensuring that CEQA requirements and all other applicable regulations are met. Other agencies that may have permitting approval or review authority over portions of the proposed Project are listed below:

• Central Valley Regional Water Quality Control Board (C.V.R.W.Q.C.B.), Report of Waste Discharge. Califia Farms originally disposed of process water by land application to a 525-acre site that is permitted under Sun Pacific Shippers, under Order 96-169 issued to Exeter Packers (doing business as Sun Pacific Shippers). In 2016, Califia Farms was issued a new permit (Order R5-2017-0019) which allowed Califia Farms to discharge process water directly into the adjacent Lerdo Canal. Califia Farms has prepared a Report of Waste Discharge to support the update of their WDRs to increase their permitted daily maximum discharge volume to the Lerdo Canal or Rosedale Spreading Basins.

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# 3.0 Environmental Checklist

# **Project Information**

#1. Project title:	Califia Farms Recycled Water Project
#2. Lead agency name and address:	North Kern Water Storage District
#3. Contact person and phone number:	Mr. Ram Venkatesan (661) 393-2696
#4. Project location:	33380 Cawelo Avenue, Bakersfield, CA 93308
#5. Project sponsor's name and address:	Same as lead agency
#6. General plan designation:	Exclusive Agriculture
#7. Zoning:	Exclusive Agriculture
#8. Description of project: (Describe the whole action involved, including but not limited to later phases of the project, and any secondary, support, or off-site features necessary for its implementation. Attach additional sheets if necessary.)	The proposed Project consists of recycling process water from Califia Farms by discharging into the Lerdo Canal where it blends with irrigation supplies managed by the District.
#9. Surrounding land uses and setting: Briefly describe the project's surroundings:	The proposed Project is located at the Califia Farms Manufacturing Facility, 33502 Lerdo Highway, in Bakersfield, California. The Facility is surrounded by agricultural fields, roads, canals, and a medium-use industrial yard.
#10. Other public agencies whose approval is required (e.g., permits, financing approval, or participation agreement.)	Central Valley Regional Water Quality Control Board
#11. Have California Native American tribes traditionally and culturally affiliated with the project area requested consultation pursuant to Public Resources Code (PRC) Section 21080.3.1? If so, is there a plan for consultation that includes, for example, the determination of significance of impacts to tribal cultural resources, procedures regarding confidentiality, etc.?	No Tribes have requested consultation.

**Note:** Conducting consultation early in the California Environmental Quality Act (CEQA) process allows tribal governments, lead agencies, and project proponents to discuss the level of environmental review, identify and address potential adverse impacts to tribal cultural resources, and reduce the potential for delay and conflict in the environmental review process. (See PRC Section 21080.3.2.) Information may also be available from the California Native American Heritage Commission's Sacred Lands File per PRC Section 5097.96 and the California Historical Resources Information System administered by the California Office of Historic Preservation. **Please also note** that PRC Section 21082.3(c) contains provisions specific to confidentiality.

# **Environmental Factors Potentially Affected**

No environmental resources were found to have "potentially significant impacts". All environmental resources have been listed "No" in **Table 3-1** indicating that the proposed Project would have "no impact" or "less-than-significant impact" as shown by the checklist on the following pages.

Table 3-1. Environmental Resources with Potentially Significant Impacts Prior to Mitigation.<sup>1</sup>

Environmental Resources	Yes or No?
Aesthetics	No
Agriculture and Forestry Resources	No
Air Quality	No
Biological Resources	No
Cultural Resources	No
Energy	No
Geology/Soils	No
Greenhouse Gas Emissions	No
Hazards and Hazardous Materials	No
Hydrology/Water Quality	No
Land Use/Planning	No
Mineral Resources	No
Noise	No
Population/Housing	No
Public Services	No
Recreation	No
Transportation	No
Tribal Cultural Resources	No
Utilities/Service Systems	No
Wildfire	No
Mandatory Findings of Significance	No

<sup>&</sup>lt;sup>1</sup> Impacts to all resources are reduced to less-than-significant with the incorporation of mitigation measures.

# Determination (To be completed by the Lead Agency)

On the basis of this initial evaluation:	Yes or No?
I find that the proposed project COULD NOT have a si environment, and a NEGATIVE DECLARATION will be prep	
I find that although the proposed project could have a senvironment, there will not be a significant effect in this case the project have been made by or agreed to by the project provided NEGATIVE DECLARATION will be prepared.	se because revisions in
I find that the proposed project MAY have a significant effect and an ENVIRONMENTAL IMPACT REPORT is required.	ect on the environment, No
I find that the proposed project MAY have a "potentially "potentially significant unless mitigated" impact on the environment of the environment o	onment, but at least one document pursuant to by mitigation measures attached sheets. An
I find that although the proposed project could have a senvironment, because all potentially significant effects (a adequately in an earlier Environmental Impact Report DECLARATION pursuant to applicable standards, and (b) mitigated pursuant to that earlier EIR or NEGATIVE DECENSIONS or mitigation measures that are imposed upon nothing further is required.	) have been analyzed (EIR) or NEGATIVE have been avoided or CLARATION, including
Signature	Date
Ram Venkatesan	Deputy General Manager
Print Name	Title
North Kern Water Storage District Agency	
/ igotioj	

#### 3.1 Aesthetics

**#1. AESTHETICS.** Except as provided in PRC Section 21099, **would the project**:

• •		· ·	•	
#1 -a. Have a substantial adverse effect on a scenic vista?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <b>Yes.</b>
#1 -b. Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a State scenic highway?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <b>Yes.</b>
#1 -c. In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from a publicly accessible vantage point.) If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#1 -d. Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>

#### 3.1.1 Environmental Setting

The proposed Project is situated between State Route (SR) 99 and SR 58. The Califia Farms Manufacturing Facility is zoned as letter "A" (signifying exclusive agriculture) (Kern County 1988). The Project area is flat and is comprised of paved and unpaved roads, open water canals, and various agricultural crops (*see* **Appendix A** for photos of the Project area). There are no designated scenic vistas within the vicinity of the proposed Project (California Department of Transportation [Caltrans] 2019).

#### 3.1.2 Discussion

#1 -a, b, c, and d. Have a substantial adverse effect on a scenic vista?

Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a State scenic highway? In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from publicly accessible vantage point.) If the project is in an urbanized area, would the project

conflict with applicable zoning and other regulations governing scenic quality? Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?

There are no significant view-sheds, scenic vistas, or scenic highways located in the vicinity of the proposed Project. The proposed Project does not involve construction activities. There would be **no impact**.

### 3.2 Agriculture and Forestry Resources

**#2.** AGRICULTURE AND FORESTRY RESOURCES. In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997, as updated) prepared by the California Department of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the State's inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board. **Would the project**:

#2 -a. Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to nonagricultural use?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#2 -b. Conflict with existing zoning for agricultural use, or a Williamson Act contract?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#2 -c. Conflict with existing zoning for, or cause rezoning of, forest land (as defined in PRC Section 12220(g)), timberland (as defined by PRC Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#2 -d. Result in the loss of forest land or conversion of forest land to non-forest use?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#2 -e. Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.2.1 Environmental Setting

The Califia Farms Manufacturing Facility is designated as exclusive agriculture (Kern County 1988). Califia Farms Manufacturing Facility is not within an area designated as prime farmland per the Farmland Mapping and Monitoring Program (Department of Conservation [D.O.C.] 2018). Califia Farms Manufacturing Facility is not under a Williamson Act contract (Kern County 2010).

#### 3.2.2 Discussion

#2 -a, b, c, d, and e. Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use? Conflict with existing zoning for agricultural use, or a Williamson Act contract? Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by PRC Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))? Result in the loss of forest land or conversion of forest land to nonforest use? Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to nonforest use?

The Califia Farms Manufacturing Facility is neither situated on agricultural land designated as prime farmland nor situated on agricultural land under a Williamson Act contract. The discharge of recycled water would not interrupt adjacent farming operations. The Califia Farms Manufacturing Facility is not zoned as forest land, timberland, or timberland zoned as timberland production, therefore, no loss or conversion of forest land to non-forest land would be necessary. There would be **no impact**.

### 3.3 Air Quality

**#3. AIR QUALITY.** Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied on to make the following determinations. **Would the project**:

#3 -a. Conflict with or obstruct implementation of the applicable air quality plan?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? <u>Yes.</u>	Have No Impact? No.
#3 -b. Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? <u>Yes.</u>	Have No Impact? No.
#3 -c. Expose sensitive receptors to substantial pollutant concentrations?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? Yes.	Have No Impact? No.
#3 -d. Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? <u>Yes.</u>	Have No Impact? No.

#### 3.3.1 Environmental Setting

The proposed Project is located in the San Joaquin Valley Air Basin (S.J.V.A.B.) within Kern County. The San Joaquin Valley Air Pollution Control District (S.J.V.A.P.C.D.) is responsible for regulating air quality in Kern County.

The federal Clean Air Act and California Clean Air Act required the U.S. Environmental Protection Agency (EPA) and California Air Resource Boards (C.A.R.B.) to establish health-based air quality standards at the federal and state levels. National Ambient Air Quality Standards (N.A.A.Q.S.) and California Ambient Air Quality Standards (C.A.A.Q.S.) were established for the following seven criteria pollutants: carbon monoxide (C.O.), ozone (O<sub>3</sub>), sulfur dioxide (S.O.2.), nitrogen dioxide (N.O.2.), particulate matter less than 10 microns in diameter (PM<sub>10</sub>), particulate matter less than 2.5 microns in diameter (PM<sub>2.5</sub>), and lead. Areas of the state are designated as attainment, nonattainment, maintenance, or unclassified for the various pollutant standards according to the federal Clean Air Act and California Clean Air Act.

An "attainment" designation for an area signifies that pollutant concentrations did not violate the N.A.A.Q.S. or C.A.A.Q.S. for that pollutant in that area. A "nonattainment" designation indicates that a pollutant concentration violated the standard at least once, excluding those occasions when a violation was caused by an exceptional event, as identified in the criteria. A "maintenance" designation indicated that the area previously categorized as nonattainment is currently categorized as attainment for the applicable pollutant; though the area must demonstrate continued attainment for a specific number of years before it can be re-designated as an attainment area. An "unclassified" designation signifies that data does not support either an attainment or a nonattainment status. The EPA established N.A.A.Q.S. in 1971 for six air pollution constituents. States have the option to add other pollutants, to require more stringent compliance, or to include different exposure periods. C.A.A.Q.S. and N.A.A.Q.S. are listed in **Table 3-2**.

Table 3-2. Federal and California Ambient Air Quality Standards and Attainment Status

Pollutant	Averaging Time	California Standards Concentration	Federal Primary Standards Concentration
0-000 (0.)	8-hour	0.070 parts per million (137 micrograms per cubic meter)	0.070 parts per million (137 micrograms per cubic meter) (see Note #1)
Ozone (O <sub>3</sub> )	1-hour	0.09 parts per million (180 micrograms per cubic meter)	(None; see Note #2)
Respirable Particulate Matter	24-hour	50 micrograms per cubic meter	150 micrograms per cubic meter
(PM <sub>10</sub> )	Annual Arithmetic Mean	20 micrograms per cubic meter	(None)
Fine Particulate	24-hour	(None)	35 micrograms per cubic meter
Matter (PM <sub>2.5</sub> )	Annual Average	12 micrograms per cubic meters	12 micrograms per cubic meter
Carlas Massarida	8-hour	9 parts per million. (10 milligrams per cubic meter)	9 parts per million (10 milligrams per cubic meter)
Carbon Monoxide	1-hour	20 parts per million (23 milligrams per cubic meter)	35 parts per million (40 micrograms per cubic meter)
Nitrogon Diovido	Annual Average	0.03 parts per million (57 micrograms per cubic meters)	0.053 parts per million (100 micrograms per cubic meters)
Nitrogen Dioxide 1-hour		0.18 parts per million (339 micrograms per cubic meters)	0.100 parts per million (188 micrograms per cubic meters)
	30-day Average	1.5 micrograms per cubic meters	(None)
Lead	Rolling 3-Month Average	(None)	0.15 micrograms per cubic meter
	Quarterly Average	(None)	1.5 micrograms per cubic meter

Pollutant	Averaging Time	California Standards Concentration	Federal Primary Standards Concentration
	24-hour	0.04 parts per million (105 micrograms per cubic meter)	0.14 parts per million (for certain areas)
Sulfur Dioxide	3-hour	(None)	(None)
	1-hour	0.25 parts per million (655 micrograms per cubic meter)	0.075 parts per million (196 micrograms per cubic meter)
Sulfates	24-hour	25 micrograms per cubic meter	No Federal Standard
Hydrogen Sulfide	1-hour	0.03 parts per million. (42 micrograms per cubic meter.)	No Federal Standard
Vinyl Chloride	24-hour	0.01 parts per million. (26 micrograms per cubic meter)	No Federal Standard

#### Notes:

#1. On October 1, 2015, the national 8-hour ozone (O<sub>3</sub>) primary and secondary standards were lowered from 0.075 to 0.070 ppm. #2. 1-Hour ozone standard revoked effective June 15, 2005, although some areas have continuing obligations under that standard. Source: C.A.R.B. 2019, EPA 2016

Under the N.A.A.Q.S., the County is designated as nonattainment for 8-hour ozone, and PM<sub>2.5</sub>, and attainment/unclassified for PM<sub>10</sub>, C.O., N.O.<sub>2</sub>., S.O.<sub>2</sub>., lead, and sulfates (C.A.R.B. 2018). Under C.A.A.Q.S., the County is designated unclassified for all criteria pollutants (C.A.R.B. 2018).

The area's air quality monitoring network provides information on ambient concentrations of air pollutants in the S.J.V.A.B. Monitoring stations in Kern County are operated by S.J.V.A.P.C.D.; air quality data was obtained from the Bakersfield-California Avenue station. **Table 3-3** compares a 5-year summary of the highest annual criteria air pollutant emissions collected at this station with applicable C.A.A.Q.S., which are more stringent than the corresponding N.A.A.Q.S. Due to the regional nature of these pollutants, O<sub>3</sub>, PM<sub>2.5</sub>, and PM<sub>10</sub> are expected to be fairly representative of the Project site.

As indicated in **Table 3-3**, O<sub>3</sub>, PM<sub>2.5</sub>, and PM<sub>10</sub> standards have been exceeded over the past 5 years.

Table 3-3. Ambient Air Quality Monitoring Data Measured at the Bakersfield-California Avenue Monitoring Station

Pollutant Standards, 1-Hour Ozone	2014	2015	2016	2017	2018
Maximum 1-hour concentration (parts per million [ppm])	0.102*	0.104*	0.092*	0.122*	0.107*
Days Exceeding <sup>a</sup> C.A.A.Q.S. 1-hour (>0.09 ppm)	3	6	0	11	8
Pollutant Standards, 8-Hour Ozone	2014	2015	2016	2017	2018
National maximum 8-hour concentration (ppm)	0.092*	0.096*	0.085*	0.104*	0.098*
State max. 8-hour concentration (ppm)	0.093*	0.097*	0.086*	0.104*	0.098*
Days Exceeding <sup>a</sup> N.A.A.Q.S. 8-hour (>0.075 ppm) (See note #1)	20	28	30	47	34
Days Exceeding <sup>a</sup> C.A.A.Q.S. 8-hour (>0.070 ppm) (See note #1)	39	54	63	87	64
Pollutant Standards, Particulate Matter (PM10)	2014	2015	2016	2017	2018
National max. 24-hour concentration (micrograms per cubic meter)	430.1*	104.7	90.9	138.0	136.1
State max. 24-hour concentration (micrograms per cubic meter)	419.5*	103.6*	92.2*	143.6*	142.0*
State max. 3-year average concentration (micrograms per cubic meter)	41	44	44	44	43
State annual average concentration (micrograms per cubic meter)	N/A	44.1	40.9	42.6	N/A
Days Exceeding <sup>a</sup> N.A.A.Q.S. 24-hour (>150 micrograms per cubic meter)	N/A	0	0	0	0
Days Exceeding <sup>a</sup> C.A.A.Q.S. 24-hour (>50 micrograms per cubic meter)	N/A	121.4	121.4	98.7	N/A
Pollutant Standards, Particulate Matter (PM2.5)	2014	2015	2016	2017	2018
National max. 24-hour concentration (micrograms per cubic meter)	101.9*	107.9*	66.4*	101.8*	98.5*
State max. 24-hour concentration (micrograms per cubic meter)	101.9	111.9	66.4	101.8	98.5
State annual average concentration (micrograms per cubic meter)	18.6*	16.6*	15.9*	15.9*	15.6*
Days Exceeding <sup>a</sup> N.A.A.Q.S. 24-hour (>35 micrograms per cubic meter)	39.3	32.3	25.5	30.2	40.3

#### Notes:

<sup>\* =</sup> Values in excess of applicable standard.

N/A =There was insufficient (or no) data available to determine the value.

<sup>2018</sup> is the latest year of data available as of preparation of this Chapter.

<sup>#1.</sup> An exceedance is not necessarily a violation. Sources: C.A.R.B. 2020.

#### 3.3.2 Discussion

# #3 -a and b. Conflict with or obstruct implementation of the applicable air quality plan? Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard?

The proposed Project does not involve construction-related activities. The discharge of process water into the Lerdo Canal would not result in particulate matter (PM) emissions. Califia Farms, however, may be required to discharge process water directly into the District's Rosedale Spreading Basins via water trucks when Lerdo Canal is undergoing maintenance in January. Therefore, the proposed Project may generate criteria pollutants from the use of diesel-powered vehicles. This discharge would require approximately 45 truck trips per day. Assuming the entire month of January, the proposed Project would generate 1,395 truck trips per year.

To streamline the process of assessing significance of criteria pollutant emissions from common construction projects, S.J.V.A.P.C.D has developed a screening tool, the Small Project Analysis Level (SPAL) to assist in determining if constructing a project in the County would exceed the construction significance threshold for criteria pollutants. The tool uses project type and size, and S.J.V.A.P.C.D. pre-quantified emissions to determine a size below which it is reasonable to conclude that a project would not exceed applicable thresholds of significance for criteria pollutants (S.J.V.A.P.C.D., 2017). Construction of a project that does not exceed the screening level are considered to have a less-than-significant impact on air quality (**Table 3-4**). The proposed Project would result in up to 1,395 trucks *trips per year* which is significantly lower than the SPAL threshold, which is measured by *trips per day*.

Table 3-4. Small Project Analysis Level by Vehicle Trips.

Land Use Category	Project Size
Residential Housing	1,453 trips per day
Commercial	1,673 trips per day
Office	1,628 trips per day
Institutional	1,707 trips per day
Industrial	1,506 trips per day

Source: S.J.A.P.C.D. 2017

To date, Califia Farms has not discharged process water directly into the Rosedale Spreading Basin. Even if required to do so, the truck trips, and thus PM emissions, would be confined to a 2- to 4-week period in January. Given the short-term emissions, impacts would be **less-than-significant.** 

# #3 -d. Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?

Human response to odors is subjective, and sensitivity to odor varies from person to person. Typically, odors are considered an annoyance rather than a health hazard; however, a person's response to odor can range from psychological (e.g., irrigation, anger, anxiety) to physiological (e.g., circulatory and respiration reaction, nausea, headaches). Califia Farms is

located in a predominately agricultural area. The closest sensitive receptors include the Westside Energy Services and Education Center approximately 1.5 miles to the west and a single-family residence approximately 1.6 miles to the southeast. As mentioned above, the proposed Project would generate odor from the use of diesel fuels, though this would be short-term. Discharges to the Lerdo Canal would not produce odors. Potential odor effects would be **less-than-significant**.

# 3.4 Biological Resources

#### #4. BIOLOGICAL RESOURCES. Would the project:

#4 -a. Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#4 -b. Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#4 -c. Have a substantial adverse effect on State or Federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?	Have Potentially Significant Impact? No	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#4 -d. Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#4 -e. Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#4 -f. Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? Yes or No.	Have No Impact? <u>Yes.</u>

#### 3.4.1 Environmental Setting

The Califia Farms Manufacturing Facility is bordered by agricultural fields to the north, east, and south; a medium-use industrial yard to the west. Topography is generally flat, with an average elevation of approximately 450 feet above mean sea level. The Califia Farms Manufacturing Facility does not support any vegetation. Lerdo Canal, at the discharge point, parallels Lerdo Highway and is frequently maintained to prevent ruderal vegetation from growing.

#### 3.4.2 Discussion

#4 -a, b, c, and d. Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or the U.S. Fish and Wildlife Service? Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service? Have a substantial adverse effect on state- or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means? Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?

The proposed Project does not include construction-related activities which could result in habitat modification. Moreover, riparian habitat, wetlands, and other sensitive natural communities, as classified by United States Fish and Wildlife Service and California Department of Fish and Wildlife, are not situated on or adjacent to the Califia Farms Manufacturing Facility. Increasing discharges into the Lerdo Canal would not interfere with the movement of wildlife species which may use the canal as a migratory wildlife corridor, albeit limited in scope and duration. There would be **no impact** on such resources.

# #4 -e. Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?

The 2004 Kern County General Plan, which is currently being updated, includes several policies and implementation measures designed to protect and conserve threatened and endangered species and oak trees (Kern County 2004a). No oak trees are present on or near the Califia Farms Manufacturing Facility, and the proposed Project has no potential to conflict with Kern County's General Plans oak retention policy. The Kern County General Plan requires discretionary projects to consider effects to biological resources and wildlife agency comments during the CEQA process; this is consistent with the CEQA process being implemented by the District for the proposed Project. Therefore, implementing the proposed Project would not conflict with any local policies or ordinances protecting biological resources and there would be **no impact**.

#### #4 -f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan?

The Califia Farms Manufacturing Facility is situated within the area proposed to be covered by the Kern County Valley Floor Habitat Conservation Plan. A draft of the plan was issued many years ago (Kern County Planning Department 2006), but a final plan has not been released. The Califia Farms Manufacturing Facility is within an extensive area of "White Zone," which is of lower conservation concern and not identified for acquisition of preserve areas. Therefore,

implementing the proposed Project would not conflict with any provisions, guidelines, goals, or objectives related to biological resources anticipated to be included in a potential final and adopted version of this plan. Therefore, no conflict with an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved conservation plan would occur, and there would be **no impact**.

#### 3.5 Cultural Resources

#### #5. CULTURAL RESOURCES. Would the project:

#5 -a. Cause a substantial adverse change in the significance of a historical resource pursuant to California Code of Regulations (CCR) Section 15064.5?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#5 -b. Cause a substantial adverse change in the significance of an archaeological resource pursuant to CCR Section 15064.5?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#5 -c. Disturb any human remains, including remains interred outside of dedicated cemeteries?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.5.1 Environmental Setting

The Califia Farms Manufacturing Facility is a highly developed site consisting of buildings, parking lots, and holding ponds. Lerdo Canal is a historic-era earthen canal constructed in 1953.

#### 3.5.2 Discussion

#5 -a, b, and c. Cause a substantial adverse change in the significance of a historical resource pursuant to in CCR Section 15064.5? Cause a substantial adverse change in the significance of an archaeological resource pursuant to CCR Section 15064.5? Disturb any human remains, including remains interred outside of dedicated cemeteries?

Under CEQA, public agencies must consider the effects of their actions on "historical resources." CEQA defines an "historical resource" as any resource listed in or determined to be eligible for listing in the California Register of Historical Resources (CRHR). The CRHR includes resources listed in or formally determined eligible for listing in the National Register of Historic Places (NRHP), as well as some California Historical Landmarks and Points of Historical Interest. Properties of local significance that have been designated under a local preservation ordinance (local landmarks or landmark districts) or that have been identified in a local historical resources inventory may be eligible for listing in the CRHR and are presumed to be significant resources for purposes of CEQA unless a preponderance of evidence indicates otherwise (California PRC Section 5024.1, 14 CCR Section 4850). The eligibility criteria for listing in the CRHR are similar to those for NRHP listing but focus on importance of the resources to California history and heritage.

A cultural resource may be eligible for listing in the CRHR if it:

- 1. is associated with events that have made a significant contribution to the broad patterns of California's history and cultural heritage
- 2. is associated with the lives of persons important in our past
- 3. embodies the distinctive characteristics of a type, period, region, or method of construction or represents the work of an important creative individual or possesses high artistic values
- 4. or has yielded, or may be likely to yield, information important in prehistory or history

In addition to meeting one or more of the above criteria, resources eligible for listing in the CRHR must retain enough of their historic character or appearance to be recognizable as historical resources and to convey the reasons for their significance. Integrity is evaluated with regard to the retention of location, design, setting, materials, workmanship, feeling, and association (Office of Historic Preservation 1997).

Impacts would be deemed significant if there is substantial adverse change by means of physical demolition, destruction, relocation, or alteration of the resource or its immediate surroundings such that the significance of the resource would be materially impaired. Per Section 15064.5 (b)(2) of the CEQA Guidelines the significance of a historical resource is materially impaired when a project:

- Demolishes or materially alters in an adverse manner those physical characteristics of an historical resource that convey its historical significance and that justify its inclusion in, or eligibility for, inclusion in the California Register of Historical Resources; or
- Demolishes or materially alters in an adverse manner those physical characteristics that account for its inclusion in a local register of historical resources pursuant to section 5020.1(k) of the Public Resources Code or its identification in an historical resources survey meeting the requirements of section 5024.1(g) of the Public Resources Code, unless the public agency reviewing the effects of the project establishes by a preponderance of evidence that the resource is not historically or culturally significant; or
- Demolishes or materially alters in an adverse manner those physical characteristics of an historical resource that convey its historical significance and that justify its eligibility for inclusion in the CRHR as determined by a lead agency for the purposes of CEQA.

The proposed Project involves discharge of treated water into Lerdo Canal. For the purposes of this Project, Lerdo Canal is ineligible for NRHP listing because of a lack of integrity. Therefore, it is not considered a historical resource for the purposes of CEQA.

In regard to archaeological resources and the disturbance of human remains, the Califia Farms Manufacturing Facility and Lerdo Canal are heavily disturbed features. Moreover, the proposed Project does not involve construction-related activities. Therefore, there is no possibility of encountering buried archaeological resources and human remains during Project activities. There would be **no impact**.

#### 3.6 Energy

#### #6. ENERGY. Would the project:

#6 -a. Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#6 -b. Conflict with or obstruct a State or local plan for renewable energy or energy efficiency?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>

# 3.6.1 Environmental Setting

Electricity and natural gas are supplied to Kern County by Pacific Gas and Electric (PG&E), Southern California Edison, and Southern California Gas (Kern County 2004a). In 2018, the total electricity consumption for Kern County was approximately 15,942 million kilowatts per hour (California Energy Commission [CEC] 2018).

#### 3.6.2 Discussion

# #6 -a. Result in potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?

The proposed Project does not include construction-related activities. The increase of recycled water is a result of Califia Farms manufacturing process which does not involve wasteful, inefficient, or unnecessary consumption of energy resources. There would be **no impact**.

# #6 -b. Conflict with or obstruct a State or local plan for renewable energy or energy efficiency?

Kern County does not have a local plan for renewable energy or energy efficiency. The proposed Project would comply with the state's Climate Commitment to reduce the reliance on non-renewable energy sources by half by 2030 (CEC 2015). There would be **no impact**.

# 3.7 Geology and Soils

# **#7. GEOLOGY AND SOILS. Would the project:**

· · ·				
#7 -a. Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:				
#7 -a. i. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? (Refer to California Geological Survey Special Publication 42.)	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#7 -a. ii. Strong seismic ground shaking?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#7 -a. iii. Seismic-related ground failure, including liquefaction?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#7 -a. iv. Landslides?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#7 -b. Result in substantial soil erosion or the loss of topsoil?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>

#### **#7. GEOLOGY AND SOILS. Would the project:**

#7 -c. Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#7 -d. Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994, as updated),), creating substantial direct or indirect risks to life or property?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#7 -e. Have soils incapable of adequately supporting the use of septic tanks or alternative waste-water disposal systems where sewers are not available for the disposal of wastewater?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#7 -f. Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

### 3.7.1 Environmental Setting

The eastern two-thirds of Califia Farms Manufacturing Facility consists of Delano sandy loam, drained soil; the western one-third consists of driver coarse sandy loam and Wasco sandy loam (Natural Resources Conservation Service 2021). Califia Farms Manufacturing Facility is located approximately 3 miles west of the Premier Fault and approximately 4 miles south the Poso Creek Fault (California Geological Survey [CGS] 2010a). The proposed Project is not located in or near a fault zone, landslide zone, or liquefaction zone (CGS 2021). The proposed Project is located on "marine and non-marine (continental) sedimentary rock" (CGS 2010b).

#### 3.7.2 Discussion

- #7 -a. Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:
- #7 -a. i, ii, iii, and iv. Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault? (Refer to California Geological Survey Special Publication 42.) Strong seismic ground shaking? Seismic-related ground failure, including liquefaction? Landsides?

The proposed Project does not include construction-related activities. The Califia Farms Manufacturing Facility is not located within or near a fault zone, known liquefaction zone, or landslide zone. There would be **no impact**.

#7 -b, c, and d. Result in substantial soil erosion or the loss of topsoil? Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on or off-site landslide, lateral spreading, subsidence, liquefaction or collapse? Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994, as updated), creating substantial direct or indirect risks to life or property?

Because the proposed Project does not include construction-related activities, it is not subject to erosion, loss of topsoil, landslide, or subsidence. The Califia Farms Manufacturing Facility is not located within or near a known liquefaction zone. The onsite soils are well-drained and not subject to collapse. There would be **no impact**.

#7 -e. Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?

The proposed Project would not require the use of septic tanks or alternative wastewater disposal systems. Therefore, there would be **no impact**.

# #7 -f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?

Although the Califia Farms Manufacturing Facility is located on marine and non-marine (continental) sedimentary rock, to which paleontological resources are known to occur, the proposed Project does not include construction-related activities. There would be **no impact**.

#### 3.8 Greenhouse Gas Emissions

#### #8. GREENHOUSE GAS EMISSIONS. Would the project:

#8 -a. Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? <u>Yes.</u>	Have No Impact? No.
#8 -b. Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? <u>Yes.</u>	Have No Impact? No.

#### 3.8.1 Environmental Setting

Kern County has not adopted a local plan for reducing greenhouse gas (GHG) emissions. The S.J.V.A.P.C.D. has adopted the Guidance for Valley Land-use Agencies Addressing GHG Emissions Impacts for New Projects under CEQA (Guidance) (S.J.V.A.P.C.D. 2009).

#### 3.8.2 Discussion

# #8 -a. Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?

GHG emissions would potentially be generated during the use of diesel-powered vehicles to discharge water directly into the District's Rosedale Spreading Basins during periods when the Lerdo Canal is out of service for maintenance. Project operations will not result in GHG emissions. Therefore, GHG emissions related to vehicle engine exhaust would be **less-than-significant**.

# #8 -b. Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?

California has issued numerous Executive Orders directing state agencies to implement programs to reduce GHG emissions to meet 2030 target of 40 percent below 1990 levels (California 2018). C.A.R.B. is the primary state agency responsible implementing GHG reduction programs. Kern County does not have an adopted local greenhouse gas reduction plan. The S.J.V.A.P.C.D. provides guidance for addressing GHG emissions from land use development projects. The S.J.V.A.P.C.D. considers development projects to be less than significant if the project achieves 29 percent GHG emission reductions target by using approved Best Performance Standards (BPS), which includes project design elements and technologies, such as the use of energy efficient equipment, that reduce GHG emissions (S.J.V.A.P.C.D. 2009). The Guidance does not require quantification of project specific GHG emissions for projects that implement BPS. Consistent with CEQA Guidelines, such projects would be determined to have a less-than-significant individual and cumulative impact for GHG emissions (S.J.V.A.P.C.D. 2009). Because the District would comply with the Guidance, the impact would be **less-than-significant**.

# 3.9 Hazards and Hazardous Materials

# **#9. HAZARDS AND HAZARDOUS MATERIALS. Would the project:**

#9 -a. Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#9 -b. Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#9 -c. Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#9 -d. Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#9 -e. For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#9 -f. Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#9 -g. Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?	Have Potentially Significant Impact? No.	Have Less-than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.9.1 Environmental Setting

Queries of the (State Water Resource Control Board) SWRCB Geotracker and California Department of Toxic Substances Control Envirostor indicate that hazardous materials are not located on the Califia Farms Manufacturing Facility (SWRCB 2021; Department of Toxic Substance Control 2020). The Califia Farms Manufacturing Facility is also not located in a high-severity fire hazard zone (California Department of Forestry and Fire Department [CALFIRE] 2007a and 2007b). The Califia Farms Manufacturing is located approximately 2.5 miles east of the Shafter-Minter Field.

#### 3.9.2 Discussion

#9 -a, b, c, d, e, f, and g. Create a significant hazard to the public or the

environment through the routine transport, use, or disposal of hazardous materials? Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment? Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school? Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment? For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area? Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan? Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?

The proposed Project is located adjacent to agricultural fields, roads, canals, and a medium-use industrial yard. The proposed Project is located away from population centers; involving hazardous materials; and would not rely on liquid fuels. The proposed Project would not expose people to increased risks from wildland fire as the Califia Farms Manufacturing Facility is not located within a high-severity fire zone. Because Califia Farms Manufacturing Facility is not within an Airport Influence Area, the proposed Project would not need to be reviewed to insure compatibility with the Airport Land Use Compatibility Plan. The proposed Project would not interfere with traffic routes or response vehicle transport. There would be **no impact**.

# 3.10 Hydrology and Water Quality

# #10. HYDROLOGY AND WATER QUALITY. Would the project:

#10 -a. Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? <u>Yes.</u>	Have No Impact? No.
#10 -b. Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? <u>Yes.</u>	Have No Impact? No.

#10 -c. Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:

#10 -c. i. result in substantial erosion or siltation on- or off-site;	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#10 -c. ii. substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or offsite;	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#10 -c. iii. create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>

#10. HYDROLOGY AND WATER QUALITY. Would the project:

#10 -c. iv. impede or redirect flood flows?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#10 -d. In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#10 -e. Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? Yes.	Have No Impact? No.

#### 3.10.1 Environmental Setting

The District encompasses an area of approximately 60,000 acres in Kern County, northwest of Bakersfield, east of Shafter and Wasco, and west of McFarland. The District's fundamental purpose is to "build-up and maintain the groundwater storage underlying the District." This is accomplished though importing surface water and managing it conjunctively with the underlying groundwater. Their conjunctive use program allows for "wet year" water supplies to be distributed to approximately 1,700 acres of water spreading facilities (to the extent there is water available in excess to irrigation demand) and extracted as groundwater during "dry years" to meet irrigation demand. In 2015, treated produced water from CRC was added to the District's water supply portfolio under Order R5-2015-0127. In 2017, under Order R5-2017-0019, process water from Califia was added to the District's water supplies as well.

The District's strategy for managing water resources is based on availability of surface water supplies and irrigation demand. Water supplies vary substantially from year-to-year due to the inherent hydrologic variability of surface water supply. In 2020, the average water distributed throughout the District from the Lerdo Canal is approximately 71,745 AF for irrigation: of this, 66,519 AF was used for irrigation and approximately 5,5226 AF of Kern River water was discharged to the Rosedale Spreading Basins. Based on 2020 Self-Monitoring Reports, CRC directly delivered 1,849 AF of produced water to the Rosedale Spreading Basins.

The volumes of various water supplies conveyed through the Lerdo Canal in 2020 are representative of an average water year. Kern River is the predominate source of supply, composing approximately 84-percent of the annual totals, whereas CRC deliveries to the Lerdo are approximately 10-percent and local groundwater is estimated at 6-percent.

The 608-acre Rosedale Spreading Basins are an integral part of the District's conjunctive use program. Kern Riverwater is the principal source of water for spreading and a portion of CRC's produced is also spread. As a generalization, spreading occurs when available water supplies exceed demands. All water, regardless of source, is discharged into the 9-2 and/or 9-0-18 lateral canals, from which water is then distributed and diverted into individual spreading ponds within the Rosedale Spreading Basins for percolation. Accordingly, the shared conveyance provided by the 9-2 and 9-0-18 lateral canals results in blending prior to discharge to an individual spreading pond. Similarly, Califia Farms' process water would be discharged via water truck into the lateral canals and will blend with other sources of supply in the lateral canals.

In January of most years, the Lerdo Canal is drained for annual maintenance. During this period, all produced water is routed to the Rosedale Spreading Basins. Depending on where maintenance is needed, Califia Farms' water may also need to be trucked to the Rosedale Spreading Basins for up to two weeks (14 days).

#### 3.10.2 Discussion

### #10 -a. Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?

Information for this water quality and antidegradation analyses has been extracted from the Report of Waste Discharge (*see Appendix B*).

#### **Water Quality Analysis**

Based on the data reviewed from the routine and annual monitoring, Califia Farms' process water meets all state and regional water quality standards as well as the District's water quality thresholds, except for EC. GEI evaluated sources of salinity and prepared a Salinity Management Plan (SMP), which focused on conductivity, sodium and chloride. Opportunities to reduce salinity included replacing Califia Farms' source water well with a better quality well, changes in sulfide treatment process, and some chemical changes. Understanding that increasing salts is a concern for the Central Valley, and for the District, Califia has already implemented the alternatives predicted to significantly reduce their salt load. Results of these improvements are demonstrated by reduced concentrations of conductivity, sodium, and chloride, which are presented graphically in **Figure 3-1** and tabularly in **Table 3-5**. The results are taken from Califia Farms' 700,000-gallon oxidation ditch (*refer to* Figure 2-2).

Blending calculations were prepared for multiple blending scenarios to evaluate the potential impact of Califia Farms' increased discharge. This evaluation demonstrates that Califia Farms' discharge water, when blended with Lerdo Canal's sources of supply, does not materially change the receiving water quality. Modeled water quality data is presented in this section to evaluate the impacts of increasing Califia Farms' discharge volume from the current daily maximum of 150,000 gpd (0.2 CFS) to 500,000 gpd (0.8 CFS). Various scenarios are evaluated and provide estimated values based on average flow rates in **Table 3-6** and the water quality values in **Table 3-7**.

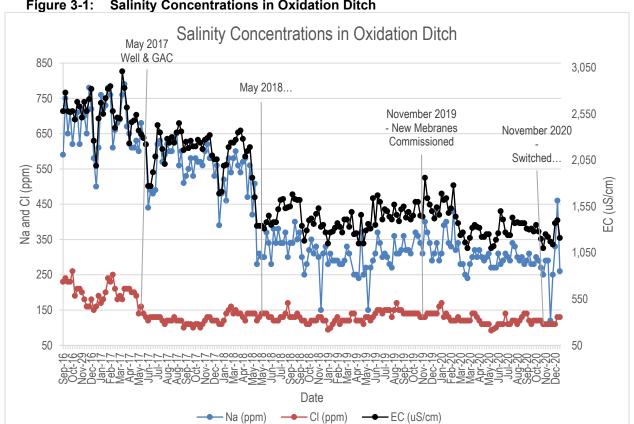


Figure 3-1: Salinity Concentrations in Oxidation Ditch

**Table 3-5.** Water Quality Changes in the Oxiditch

•	Sept 2016 -	Well / GAC	Chemical Changes	Nanofiltration	Disinfectant Change	Water
	May 2017	Jun 2017- May 2018	Jun 2018– Dec 2019	Jan-Oct 2020	Nov-Dec 2020	Quality Objectives
Conductivity (µS/cm)	2,553	2,103	1,438	1,339	1,229	700
Sodium (ppm)	674	536	313	305	280	-
Chloride (ppm)	194	125	132	121	116	106

Table 3-6. Water Sources and Average Flows

Water Source	Range of Flow	Comments
Lerdo Canal	109 CFS	2020 Records of Station B Average Daily Flows
CRC average to basins	1,849 AFY	2020 Hydrographic Report
Califia Farms daily to Canal	0.2 CFS	2016 permitted value
Califia Farms proposed maximum to Canal	0.8 CFS	Proposed Volume in 2021 Report of Waste Discharge
Kern River Water to basins	5,226 AFY	2020 Hydrographic Report
Califia Maximum Discharge to Basins	22 AFY	14-days at proposed maximum

Table 3-7. Table of Water Quality Values Used in Blending Calculations

Water Source	EC (μS/cm)	Chloride (mg/L)
Lerdo Canal (Station B Flows)	409	40
CRC Produced Water	611	66
Groundwater	2,057	380
Califia Farms	1,229	116
District Thresholds	<650	<100

Constituent values presented in Table 3-7 for the Lerdo Canal (Station B Flows) are from the 2020 Kern River Annual Hydrographic Report, which is representative of average water year operations. Groundwater values represent a flow-weighted average using current data from the District's groundwater pump-in wells after the CRC discharge point (*refer to* Figure 2-1). Califia Farms' constituent values are based on an average of sample results from November through December 2020, which represent current discharge quality incorporating the most recent process improvements.

To quantify the potential impact from Califia Farms' increased discharge, blending scenarios that consider irrigation's seasonal demand fluctuations and conjunctive use operations in Lerdo Canal were evaluated. These scenarios account for the instantaneous water quality and cumulative impact of Califia Farms' discharge with all current water supplies at Califia's current and future flow rates.

**Table 3-8** summarizes the results of modeled irrigation water quality. Historical water quality data has been submitted to RWQCB in Califia Farms' self-monitoring reports since the initial project was permitted in 2016.

Table 3-8. Modeled Lerdo Canal for Irrigation Water Quality

Lerdo Canal Blending	EC (μS/cm)	CI (mg/L)
2020 average of all Lerdo Canal supplies at 109 CFS	511	65
with Califia Farms' discharge at 0.2 CFS	512	65
with proposed capacity of Califia Farms' discharge at 0.8 CFS	516	65

In January of most years, the Lerdo Canal is drained for annual maintenance. During this period, all produced water is routed to the Rosedale Spreading Basins and the District may direct Califia Farms to truck water. Under this scenario, it is assumed that the discharge to spreading consists of Kern River supplies, CRC produced water, and Califia Farms' process water. Consequently, blending of these supplies have been evaluated separately from blending in the Lerdo Canal. Surface water is delivered via pipeline into the District's 9-2 and/ or 9-0-18 lateral canals. Califia Farms' process water is discharged via a 5,000-gallon water truck into the lateral pools where it is blended with other water supplies. **Table 3-9** summarizes the results of modeled water quality considering both a flow-weighted and an annual average volume scenario.

Table 3-9. Modeled Rosedale Spreading Basins Water Quality

Source	AFY	EC (µS/cm)	CI (mg/L)
Kern River	5,226	201	5.7
CRC	1,849	432	7
Califia Farms	22	1,229	116
	Blended Water:	149	4

At Califia Farms' currently permitted discharge of 150,000 gpd, or 5.6 AF over a 14-day period, conductivity of the blended waters is calculated to be 147  $\mu$ S/cm and chloride is calculated as 4 ppm. Increasing the volume of Califia Farms' recycled water, does not materially change receiving water quality. This is largely due to the significant process improvements made to reduce salinity. With the current discharge quality and proposed volume, the proposed discharge can meet all State and regional policies and does not contribute to degrading water quality in the region. In each of the scenarios evaluated, the blended water quality meets all State and regional objectives. Therefore, the impact is **less-than-significant**.

#### **Anti-Degradation Analysis**

State Water Resources Control Board Resolution No. 68-16 (Policy with respect to Maintaining High Quality Water of the State), commonly referred to as the Antidegradation Policy, requires RWQCB regulated discharges to maintain high-quality waters of the State. Qualitative guidance provide that discharges shall be consistent with the maximum benefit to the people of the State, will not unreasonably affect present and anticipated beneficial uses, and will not result in water quality less than that prescribed by the State and regional objectives.

The Water Quality Control Plan for the Tulare Lake Basin Plan designates beneficial uses of the Kern County Basin as industrial service supply; industrial process supply; municipal and domestic water supply; and agricultural supply. Both numerical and narrative objectives are identified to protect groundwater; the narrative objective states that "ground waters shall not contain chemical constituents in concentrations that adversely affect beneficial uses" (RWQCB 2020). The agricultural goal for EC is 700  $\mu$ S/cm. The average EC of Califia Farms' blended water is 511  $\mu$ S/cm. Blended water quality in both the Lerdo Canal and Rosedale Spreading Basins meet these objectives. Therefore, the impact is **less-than-significant**.

# #10 -b. Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?

Califia Farms' process water may be discharged either directly or indirectly (through the Lerdo Canal) into the District's Rosedale Spreading Basins. Changes to groundwater levels are expected to be beneficial to existing and potential users of the groundwater resource. Therefore, impacts are **less-than-significant**.

- #10 -c. Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:
  - #10 -i, ii, iii, and iv) Result in substantial erosion or siltation on- or off-site; Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or offsite; Create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or Impede or redirect flood flows?

Because the proposed Project does not include construction-related activities, the existing drainage pattern of the site or area will not be altered. There would be **no impact**.

## #10 -d. In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?

Califia Farms Manufacturing Facility is not located in a flood hazard, tsunami, or seiche zone. There will be **no impact.** 

### #10 -e. Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?

During wet years, Califia Farms process water may be discharged into the District's Rosedale Spreading Basins via the Lerdo Canal. Consequently, this activity would enhance the District's groundwater management and conjunctive use program. As discussed above, blending effectively

reduces concentrations to meet all state and basin water quality objectives, as well as the District' water quality thresholds for agriculture. Therefore, the impact is <b>less-than-significant</b> .

#### 3.11 Land Use and Planning

#### #11. LAND USE AND PLANNING. Would the project:

#11 -a. Physically divide an established	Have	Have Less-	Have Less-	Have No
community?	Potentially	than-Significant		Impact?
	Significant Impact?	Impact with Mitigation	Significant Impact?	<u>Yes.</u>
	No.	Incorporated?	No.	
#11 -b. Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.11.1 Environmental Setting

Califia Farms Manufacturing Facility is zoned as exclusive agriculture (Kern County 1988). Califia Farms Manufacturing Facility is located in a rural area and surrounded by various agricultural crops and water conveyance canals, including the Lerdo Canal. Califia Farms Manufacturing Facility is located 1.5 miles east of the unincorporated community of Cawelo.

#### 3.11.2 Discussion

#11 -a and b. Physically divide an established the community, and cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?

The proposed Project does not involve construction and will not physically divide any communities. The proposed Project does not conflict with the Kern County General Plan or any other land use plan. There would be **no impact**.

#### 3.12 Mineral Resources

#### #12. MINERAL RESOURCES. Would the project:

#12 -a. Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the State?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#12 -b. Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>

#### 3.12.1 Environmental Setting

Califia Farms Manufacturing Facility is located within a Surface Mining and Reclamation Act of 1975 (S.M.A.R.A.) study area for aggregate materials in the Bakersfield Production-Consumption Region. Califia Farms Manufacturing Facility is designated as mineral resource zone-3 (Areas containing mineral deposits, the significance of which cannot be evaluated from available data) (D.O.C. 2009).

#### 3.12.2 Discussion

# #12 -a. Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the State?

The Califia Farms Manufacturing Facility is located in a S.M.A.R.A. study area but there are no known significant mineral deposits. The proposed Project does not involve construction-related activities. There would be no loss of mineral resources (if any are present) because soil would not be impact. There would be **no impact**.

# #12 -b) Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?

The Califia Farms Manufacturing Facility is not located within the vicinity of a locally important mineral resource recovery site. There would be **no impact**.

#### **3.13** Noise

#### #13. NOISE. Would the project:

#13 -a. Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or in other applicable standards of other agencies?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#13 -b. Generation of excessive ground-borne vibration or ground-borne noise levels?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#13 -c. For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.13.1 Environmental Setting

The Califia Farms Manufacturing Facility is located in a predominately agricultural area. The closest sensitive receptors include the Westside Energy Services and Education Center approximately 1.5 miles to the west and a single-family residence approximately 1.6 miles to the southeast. The Califia Farms Manufacturing Facility is located approximately 2.5 miles east of the Shafter-Minter Field (i.e., airport).

#### 3.13.2 Discussion

#13 -a and b. Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or in other applicable standards of other agencies? Generation of excessive ground-borne vibration or ground-borne noise levels?

The proposed Project does not involve construction-related activities. The discharge of an additional 500,000 gpd (maximum) into the Lerdo Canal would not increase ambient noise levels, ground-borne vibration, or ground-borne noise levels. There would be **no impact**.

#13 -c) For a project located within-the vicinity of a private airstrip or-an airport land use plan or, where such a plan has not been adopted, within 2 miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?

Kern County has established an Airport Land Use Compatibility Plan which has been incorporated into the General Plan (Kern County 2012). The Califia Farms Manufacturing Facility is located

approximately 2.5 miles east of the Shafter-Minter Field. The proposed Project is not locate
within an Airport Influence Area. There would be <b>no impact</b> .

#### 3.14 Population and Housing

#### #14. POPULATION AND HOUSING. Would the project:

#14 -a. Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?		Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#14 -b. Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.14.1 Environmental Setting

The Califia Farms Manufacturing Facility is located 1.5 miles east of the unincorporated community of Cawelo. In 2020, the population of Kern County was estimated to be 917,553 (Department of Finance 2020).

#### 3.14.2 Discussion

# #14 -a. Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?

The proposed Project would not be growth inducing and as such would not result in the development of new housing. Construction and operation of the proposed Project would not require additional employees. There would be **no impact**.

# #14 -b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?

The proposed Project would not displace people or housing. The Califia Farms Manufacturing Facility is located in a predominately agricultural area with no residential properties in the vicinity. There would be **no impact**.

#### 3.15 Public Services

#### #15. PUBLIC SERVICES. Would the project:

#15 -a. Result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, or the need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times, or other performance objectives for any of the public services:	Have Potentially Significant Impact? No.	Have Less- than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
Fire protection?	Have Potentially Significant Impact? No.	Have Less- than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
Police protection?	Have Potentially Significant Impact? No.	Have Less- than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
Schools?	Have Potentially Significant Impact? No.	Have Less- than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
Parks?	Have Potentially Significant Impact? No.	Have Less- than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
Other public facilities?	Have Potentially Significant Impact? No.	Have Less- than- Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.15.1 Environmental Setting

The Kern County Sheriff and California Highway Patrol provide law enforcement services for unincorporated Kern County. The Kern County Fire Department provides fire protection to residents of the unincorporated areas of the County, and the cities of Arvin, Delano, Maricopa, McFarland, Ridgecrest, Shafter, Tehachapi and Wasco (Kern County 2004b). A mutual agreement between the County and the cities of Bakersfield, Taft, and California City allows for protection and assistance in the jurisdiction of each as needed. The County also has a mutual aid contract with U.S.F.W.S. and a service agreement with the Bureau of Land Management.

#### 3.15.2 Discussion

#15 -a. Result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, or the need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times, or other performance objectives for any of the public services: Fire protection? Police protection? Schools? Parks? Other public facilities?

The proposed Project would not require new or altered government facilities, as it would not increase the need for public services from existing conditions. There would be **no impact**.

#### 3.16 Recreation

#### #16. RECREATION. Would the project:

#16 -a. Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#16 -b. Include recreational facilities or require the construction or expansion of recreational facilities that might have an adverse physical effect on the environment?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>

#### 3.16.1 Environmental Setting

The North Kern Golf Course, which is the nearest recreational site to the Califia Farms Manufacturing Facility, is located approximately 1.8 miles to the northeast.

#### 3.16.2 Discussion

#16-a and b. Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated or include recreational facilities or require the construction or expansion of recreational facilities that might have an adverse physical effect on the environment?

The proposed Project is not growth inducing and would not increase the use of existing parks or recreational facilities or require the construction or expansion of recreational facilities. There would be **no impact**.

#### 3.17 Transportation

#### #17. TRANSPORTATION. Would the project:

#17 -a. Conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#17 -b. Conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#17 -c. Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#17 -d. Result in inadequate emergency access?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.17.1 Environmental Setting

The proposed Project is located approximately 1.1 miles east SR 99 in a rural area of Kern County. There are no transit or on-street bicycle/pedestrian facilities near the Califia Farms Manufacturing Facility.

#### 3.17.2 Discussion

#17 -a, b, c, and d). Conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)? Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)? Result in inadequate emergency access?

The proposed Project would not conflict with any program plan, ordinance, or policies. Because the proposed Project does not involve construction-related activities, road closures are not required. If Califia Farms is required to discharge directly into the District's Rosedale Spreading Basins during maintenance of the Lerdo Canal, water trucks would travel on existing paved roads (such as Zerker Road). Since no new roads are being developed, the proposed Project would not

increase impact.	hazards	due	to a	geometric	design	feature	or	incompatible	uses.	There	would	be	no

#### 3.18 Tribal Cultural Resources

**#18. TRIBAL CULTURAL RESOURCES. Would the project** cause a substantial adverse change in the significance of a tribal cultural resource, defined in PRC Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:

#18 -a. Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in PRC Section 5020.1(k), or	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#18 -b. A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of PRC Section 5024.1. In applying the criteria set forth in subdivision (c) of PRC Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.18.1 Environmental Setting

No state or federally recognized Tribes are situated on or near the Califia Farms Manufacturing Facility.

#### 3.18.2 Discussion

#18 -a and b) Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in PRC Section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in PRC Section 5020.1(k)? A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of PRC Section 5024.1. In applying the criteria set forth in subdivision (c) of PRC Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.

There are no known tribal cultural resources located on or in the vicinity of the Califia Farms Manufacturing Facility. There are no known Indian Sacred Sites on or in the vicinity of the Califia Farms Manufacturing Facility. Since no known Indian Sacred Sites have been identified within the Califia Farms Manufacturing Facility, there would be no direct, indirect, or cumulative impacts to Indian Sacred Sites from the proposed Project. The proposed Project would not have the

potential to affect or prohibit access to any ceremonial use of Indian Sacred Sites. There would <b>no impact</b> .	be

#### 3.19 Utilities and Service Systems

#### #19. UTILITIES AND SERVICE SYSTEMS. Would the project:

#19 -a. Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#19 -b. Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry, and multiple dry years?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#19 -c. Result in a determination by the wastewater treatment provider that serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#19 -d. Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#19 -e. Comply with Federal, State, and local management and reduction statutes and regulations related to solid waste?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.19.1 Environmental Setting

The Califia Farms Manufacturing Facility and its vicinity are served by PG&E, Southern California Edison, and Southern California Gas (Kern County 2004). Sewage disposal is handled by both public and private agencies, and by private individual systems. Several incorporated and unincorporated communities are served by wastewater treatment plants managed by community service districts. The closest wastewater treatment plant is the Shafter Wastewater Treatment Plant, approximately 7 miles west of the Califia Farms Manufacturing Facility. Domestic water is serviced to the public by various water purveyors consisting of public and private water systems. The closest landfill is the Shafter-Wasco Recycling and Sanitary Landfill, approximately 14 miles east of the Califia Farms Manufacturing Facility.

#### 3.19.2 Discussion

#19 -a. Require or result in the relocation or construction of new or expanded water, wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?

No utility services would need to be constructed or expanded as a result of the proposed Project. There would be **no impact**.

#19 -b. Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry, and multiple dry years?

The purpose of the proposed Project is to deliver recycled water to the District. There would be **no impact**.

#19 -c. Result in a determination by the wastewater treatment provider that serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?

The Bakersfield manufacturing facility has been in operation since 2011 and currently generates a daily average of 241,000 gallons of discharge water daily, or 270 AFY, with a daily maximum of 385,000 gallons, or 431 AFY. The permitted volume is increasing to a maximum of 500,000 gpd (or approximately 560 AFY). Because Califia Farms has significantly reduced salinity in their discharge water, the District is willing and able to accept the increased volumes. There would be **no impact**.

#19 -d and e) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals? Comply with Federal, State, and local management and reduction statues and regulations related to solid waste?

Because the proposed Project would not generate solid, management and reduction statues and regulations are not applicable. There would be **no impact**.

#### 3.20 Wildfire

**#20. WILDFIRE.** If located in or near State responsibility areas or lands classified as very high fire hazard severity zones, **would the project**:

#20 -a. Substantially impair an adopted emergency response plan or emergency evacuation plan?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#20 -b. Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? <u>Yes.</u>
#20 -c. Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines, or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#20 -d. Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.

#### 3.20.1 Environmental Setting

The Califia Farms Manufacturing Facility is not located in a high-severity fire zone. The Califia Farms Manufacturing Facility is located in an unincorporated Local Responsible Area classified as un-zoned (CALFIRE 2007). The Kern County Fire Department provides fire protection for residents of the unincorporated areas of the County and the cities of Arvin, Delano, Maricopa, McFarland, Ridgecrest, Shafter, Tehachapi and Wasco (Kern County 2004b).

#### 3.20.2 Discussion

#20 -a, b, c, and d) Substantially impair an adopted emergency response plan or emergency evacuation plan? Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire? Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines, or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment? Expose people or structures to significant risks, including

# downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?

The Califia Farms Manufacturing Facility is not located in a high-severity fire zone. The proposed Project would not create any infrastructure that would exacerbate fire risk or the risk of flooding, slope instability, or drainage changes. There would be **no impact**.

#### 3.21 Mandatory Findings of Significance

#### #21. MANDATORY FINDINGS OF SIGNIFICANCE. Would the project:

#21 -a. Have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of an endangered, rare, or threatened species, or eliminate important examples of the major periods of California history or prehistory?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? No.	Have No Impact? Yes.
#21 -b. Have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects)?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? <u>Yes.</u>	Have No Impact? No.
#21 -c. Have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	Have Potentially Significant Impact? No.	Have Less- than-Significant Impact with Mitigation Incorporated? No.	Have Less- than- Significant Impact? Yes.	Have No Impact? No.

#### 3.21.1 Discussion

#21 -a. Would the project have the potential to substantially degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, substantially reduce the number or restrict the range of an endangered, rare, or threatened species, or eliminate important examples of the major periods of California history or prehistory?

The analysis conducted in this IS concludes that implementation of the proposed Project would not have a significant impact on the environment. As evaluated in Chapter 3.4, Biological Resources, the proposed Project would have no impact on biological resources. The proposed Project would not degrade the quality of the environment; reduce the habitat of a fish or wildlife species; cause a fish or wildlife population to drop below self-sustaining levels; threaten to eliminate a plant or animal community; or reduce the number or restrict the range of an endangered, rare, or threatened species. As discussed in Chapter 3.5, Cultural Resources, the proposed Project would not eliminate important examples of the major periods of California history or prehistory. There would be **no impact**.

# #21 -b. Would the project have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable future projects.)

The benefit of the proposed discharge is the blending, which enables Califia Farms to recycle their discharge water in a sustainable and environmentally responsible manner. Since the Kern Subbasin is designated as a critically overdrafted basin, returning 560 AFY to the basin enables the water to be reused on the crops Califia Farms uses in their plant-based milks.

In 2017, the District prepared an IS/ND for the Califia Farms Process Water Discharge to Lerdo Canal, which evaluated the construction of a pipeline and discharge of up to 150,000 gpd to Lerdo Canal and/or the District's Rosedale Spreading Basins. In 2018, the District released a Notice of Preparation for the Expanded Groundwater Banking Program which would increase the use of its existing "1950 Project" conjunctive use facilities and subsequently expand these facilities.

The proposed Project, in connection with past, current, and probable future projects, would still result less-than-significant impacts or no impacts on aesthetics, air quality, biological resources, cultural resources, geology and soils, GHG emissions, hazards and hazardous materials, hydrology and water quality, land use and planning, mineral resources, noise, population and housing, public services, recreation, transportation, tribal cultural resources, utilities and service systems, and wildfire. The proposed Project would not change operations of the Califia Farms Manufacturing Facility or the District's Lerdo Canal and Rosedale Spreading Basins. With blending in the Lerdo Canal and Rosedale Spreading Basins, the proposed discharge would meet all state and regional policies and would not contribute to degrading water quality in the region. Air quality and GHG emissions as a result of trucking, if necessary, would be *de minimis*. None of the proposed Project's impacts make cumulatively considerable, incremental contributions to significant cumulative impacts presented in this IS. This impact would be **less-than-significant**.

# #21 -c. Would the project have environmental effects that will cause substantial adverse effects on human beings, either directly or indirectly?

The proposed Project would result in less-than-significant impacts to air quality, GHG emission, and hydrology and water quality; however, the proposed Project would not cause substantial adverse effects on human beings, either directly or indirectly. This impact would be **less-than-significant**.

#### 4.0 References

#### Chapter 3.1, Aesthetics

- California Department of Transportation (Caltrans). 2019. List of eligible and officially designated State Scenic Highways. August 2019. Available: https://dot.ca.gov/programs/design/lap-landscape-architecture-and-community-livability/lap-liv-i-scenic-highways Accessed: January 15, 2021.
- Kern County. 1988. *Zone Maps*. Available: https://kernpublicworks.com/maps/zone-maps/Accessed: January 15, 2021.

#### Chapter 3.2, Agriculture and Forestry

- Department of Conservation (D.O.C.). 2018. *California Important Farmland Finder*. Available: https://maps.conservation.ca.gov/DLRP/CIFF/ Accessed: January 15, 2020.
- Kern County. 1988. *Zone Maps*. Available: https://kernpublicworks.com/maps/zone-maps/Accessed: January 15, 2020.
- \_\_\_\_\_. 2010. Kern County Williamson Act Parcels and Non-Renewals, California, 2010. GIS Layer. Available: https://databasin.org/datasets/b4b2b8e824114b32b1005c74663237fd Accessed: January 15, 2020.

#### Chapter 3.3, Air Quality

- California Air Resource Board (C.A.R.B.). 2018. *Maps of State and Federal Area Designations*. Available: https://ww2.arb.ca.gov/resources/documents/maps-state-and-federal-areadesignations Accessed: March 9, 2020.
- \_\_\_\_\_. 2019. *Ambient Air Quality Standards (CAAQS)*. Dated 5/4/16. Available: http://www.arb.ca.gov/research/aaqs/aaqs2.pdf Accessed: March 9, 2020
- \_\_\_\_\_. 2020. Air Quality Trend Summaries. Available: https://www.arb.ca.gov/adam/ Accessed: March 9, 2020.
- Environmental Protection Agency (EPA). 2016. *National Ambient Air Quality Standards* (*NAAQS*) *Table*. Available: https://www.epa.gov/criteria-air-pollutants/naaqs-table Accessed: March 9, 2020.
- Environmental Protection Agency (EPA). 1971. *Noise from Construction Equipment and Operations, Building Equipment, and Home Appliances* Available: http://docs.ppsmixeduse.com/ppp/DEIR\_References/1971\_1201\_usepa\_noiseconstruction.pdf Accessed: April 7, 2020.

S.J.V.A.P.C.D. 2017. *Small Project Analysis Level (SPAL)*. Available: http://www.valleyair.org/transportation/CEQA%20Rules/GAMAQI-SPAL.PDF Accessed: April 6, 2020.

#### **Chapter 3.4, Biological Resources**

Kern County Planning Department. 2006. First Public Draft, Kern County Valley Floor Habitat Conservation Plan. Prepared by Garcia and Associates, Lompoc, CA.

Kern County. 2004a. *Kern County General Plan*. Available: <a href="https://psbweb.co.kern.ca.us/planning/pdfs/kcgp/KCGP.pdf">https://psbweb.co.kern.ca.us/planning/pdfs/kcgp/KCGP.pdf</a> Accessed: January 15, 2021.

#### Chapter 3.5, Cultural

Office of Historic Preservation. 1997. National Register Bulletin How to Apply the National Register Criteria for Evaluation. U.S. Department of the Interior, National Park Service, Washington, D.C.

#### Chapter 3.6, Energy

- California Energy Commission (CEC). 2015. Fact Sheet: California's 2030 Climate

  Commitment Renewable Resources for Half of the State's Electricity by 2030.

  Available: <a href="https://ww3.arb.ca.gov/html/fact\_sheets/2030\_renewables.pdf">https://ww3.arb.ca.gov/html/fact\_sheets/2030\_renewables.pdf</a>. Accessed: January 15, 2021.

  \_\_\_\_\_\_. 2018. Electricity Consumption by County. Available:

  <a href="http://www.ecdms.energy.ca.gov/elecbycounty.aspx">http://www.ecdms.energy.ca.gov/elecbycounty.aspx</a> Accessed: January 15, 2021.
- Kern County. 2004a. *Kern County General Plan*. Available: <a href="https://psbweb.co.kern.ca.us/planning/pdfs/kcgp/KCGP.pdf">https://psbweb.co.kern.ca.us/planning/pdfs/kcgp/KCGP.pdf</a> Accessed: January 15, 2021.

#### Chapter 3.7, Geology and Soils

California Geologic Survey (CGS). 2010a. Fault Activity Map of California (2010). Available: https://maps.conservation.ca.gov/cgs/fam/ Accessed: January 15, 2021.
\_\_\_\_\_. 2010b. Geologic Map of California (2010). Available: https://maps.conservation.ca.gov/cgs/gmc/ Accessed: January 15, 2021.
\_\_\_\_\_. 2021. Earthquake Zones of Required Investigation. Available:

https://maps.conservation.ca.gov/cgs/EQZApp/app/ Accessed: January 15, 2021.

Natural Resources Conservation Service. 2021. *U.S. Department of Agriculture Natural Resources Conservation Services, Web Soil Survey*. Available: https://websoilsurvey.sc.egov.usda.gov/App/WebSoilSurvey.aspx Accessed: January 15, 2021.

#### **Chapter 3.8, Greenhouse Gas Emissions**

- California (state of California). 2018. *California Climate Change. California Climate Change Executive Orders*. Available: https://www.ca.gov/archive/gov39/wp-content/uploads/2018/09/9.10.18-Executive-Order.pdf Accessed: January 15, 2021.
- San Joaquin Valley Air Pollution Control District (SJVAPCD). 2009. Guidance for Valley Landuse Agencies in Addressing GHG Emissions Impacts for New Projects under CEQA.

  Available: http://www.valleyair.org/Programs/CCAP/12-17-09/3%20CCAP%20-%20FINAL%20LU%20Guidance%20-%20Dec%2017%202009.pdf Accessed: January 15, 2021.

#### Chapter 3.9, Hazards and Hazardous Waste

- California Department of Forestry and Fire Protection (CALFIRE). 2007a. *Fire Hazard Severity Zones in SRA for Sacramento County*. Available: https://osfm.fire.ca.gov/media/6687/fhszs\_map15.pdf Accessed: January 15, 2021.
- \_\_\_\_\_. 2007b. Very High Fire Hazard Severity Zones in LRA for Sacramento County. Available: https://osfm.fire.ca.gov/media/6686/fhszl06\_1\_map15.pdf Accessed: January 15, 2021.
- Department of Toxic Substance Control. 2020. *Envirostor Data Management System*. Available: https://www.envirostor.dtsc.ca.gov/public/map/ Accessed: January 15, 2021.
- State Water Resources Control Board (SWRCB). 2021. *Geotracker Data Management System*. Available: https://geotracker.waterboards.ca.gov/map/ Accessed: January 15, 2021.

#### Chapter 3.10, Hydrology

Regional Water Quality Control Board, Central Valley Region. 2020. Resolution R5-2020-0057

— Revisions to the Amendments to the Water Quality Control Plans for the Sacramento and San Joaquin River Basins and the Tulare Lake Basin.

#### **Chapter 3.11, Land Use and Planning**

Kern County. 1988. *Zone Maps*. Available: https://kernpublicworks.com/maps/zone-maps/Accessed: January 15, 2021.

#### **Chapter 3.12, Mineral Resources**

Department of Conservation (D.O.C.). 2009. *Special Report 210*. Available: https://maps.conservation.ca.gov/cgs/informationwarehouse/index.html?map=regulatory maps Accessed: January 15, 2021.

#### Chapter 3.13, Noise

Kern County. 2012. *Airport Land Use Compatibility Plan*. Available: https://psbweb.co.kern.ca.us/planning/pdfs/ALUCP2012.pdf Accessed: January 15, 2021.

#### **Chapter 3.14, Population and Housing**

Department of Finance. 2020. *E-1 Cities, Counties, and State Population Estimates with Annual Percent Change – January 1, 2018 and 2019*. Available: http://www.dof.ca.gov/Forecasting/Demographics/Estimates/E-1/ Accessed: January 15, 2021.

#### **Chapter 3.15, Public Services**

Kern County. 2004b. *Volume I Recirculated Draft Program Environmental Impact Report*. Available: https://psbweb.co.kern.ca.us/planning/pdfs/kcgp/KCGP\_RPEIR\_vol1.pdf Accessed: January 15, 2021.

#### Chapter 3.16, Recreation

No citations.

#### **Chapter 3.17, Transportation**

No citations.

#### **Chapter 3.18, Tribal Cultural Resources**

No citations.

#### Chapter 3.19, Utilities

Kern County. 2004. *General Plan*. Available: https://psbweb.co.kern.ca.us/planning/pdfs/kcgp/KCGP.pdf Accessed: January 15, 2021.

#### Chapter 3.20, Wildfire

CalFire. 2007. *Fire Hazard Severity Zones in SRA for Kern County*. Available: https://osfm.fire.ca.gov/media/6686/fhsz106\_1\_map15.pdf Accessed: January 15, 2021.

Kern County. 2004b. *Volume I Recirculated Draft Program Environmental Impact Report*. Available: https://psbweb.co.kern.ca.us/planning/pdfs/kcgp/KCGP\_RPEIR\_vol1.pdf Accessed: January 15, 2021.

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**Photograph 1:** Califia Farms' discharge at the Lerdo Canal.



Photograph 2: Rosedale Spreading Basins canal laterals.



# Report of Waste Discharge Recycled Water Project with North Kern Water Storage District

Bakersfield, CA

#### Submitted to:

Califia Farms, LCC 33502 Lerdo Highway Bakersfield, CA 93308



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April 15, 2021

Report of Waste Discharge Califia Farms Recycled Water Project April 15, 2021

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- A. Blending Calculations
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- C. Form 200

# **Executive Summary**

GEI Consultants, Inc. (GEI) previously prepared a Report of Waste Discharge (RWD) on behalf of Califia Farms, LLC (Califia) and North Kern Water Storage District (North Kern or District) to permit recycling Califia's process water via the Lerdo Canal. In 2017, discharge was permitted under Waste Discharge Requirements R5-2017-0019 (Order). During the fourth quarter of 2018, Califia's production volumes increased and subsequently their discharge volumes now exceed the permitted daily maximum discharge volume. The current permitted discharge volume is a maximum of 150,000 gallons per day (gpd), referred to as the current capacity in this report. Califia has increased productivity, and subsequently their discharge volume. While the average 2020 discharge volume of 241,000 gpd is believed to be representative of planned future operations, to accommodate unforeseen changes, the proposed daily maximum discharge volume is 500,000 gpd, referred to as the proposed capacity.

This RWD describes Califia's existing project, which incorporates their process water into a regional reuse project managed by North Kern. This report provides the following information:

- Description of the project area (see Figure 0-1).
- Summary of process changes resulting in improved water quality.
- Discussion of water quality, including Lerdo Canal supplies, groundwater, process water, and blended water.
- Overview of Oxidation Ditch design and water balance analysis.
- Antidegradation Analysis

Califia Farms' Bakersfield Plant manufactures plant-based milks, yogurts, juices, and specialty coffee drinks from crops locally grown in the Central Valley. When the facility began production in 2011, process water was managed under Sun Pacific's Order and was disposed through land application on a neighboring 525-acre site. As Califia's production and discharge volume rapidly increased, they sought a long-term, sustainable, and environmentally responsible discharge option that could accommodate their growing capacity.

Adjacent to Califia's facility is the Lerdo Canal (Canal), which is owned and operated by North Kern and is used to deliver water to irrigated agriculture and groundwater spreading facilities. Flow in this canal fluctuates depending on available surface water supplies and user demand. On average, flow in the Canal is approximately 100 cubic feet per second (CFS) prior to Califia's discharge. Califia is currently permitted under R5-2017-0019 to discharge 0.2 cfs and proposes to increase discharge up to 0.8 CFS to the Lerdo Canal where their process water will blend with North Kern's water supplies. Given the respective volumes and quality of water supplies in the Canal and Califia's process water quality, modeled analyses demonstrate that all District and Tulare Lake Basin (Basin) water quality thresholds are met upon blending. Analysis in this report

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shows that increasing Califia's discharge only contributes a nominal increase in conductivity: North Kern's supplies have an average level of 512  $\mu$ S/cm; Califia's discharge is estimated to increase conductivity to 516  $\mu$ S/cm. There is no increase in chloride levels.

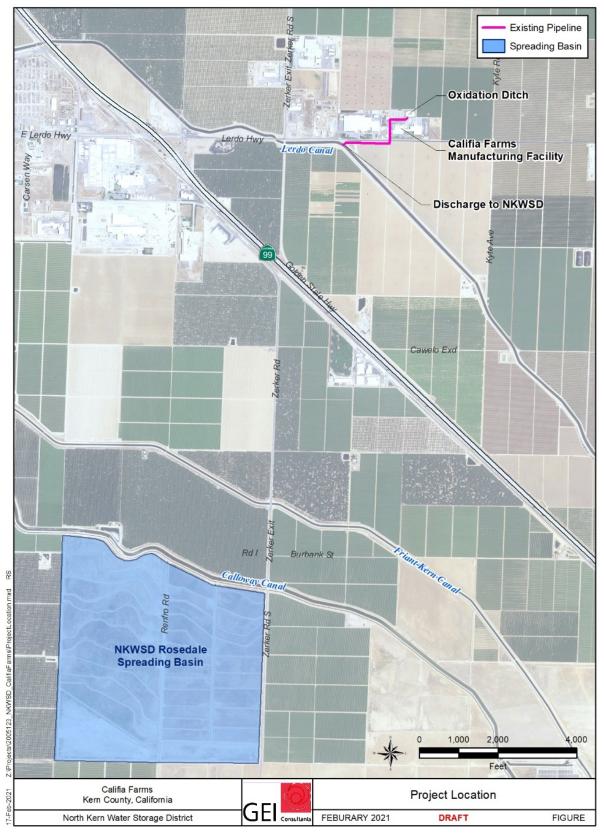


Figure 0-1. Project Location

#### 1. Introduction

This Report of Waste Discharge (RWD) has been prepared on behalf of Califia Farms, LLC (Califia) to support updating the Waste Discharge Requirements (WDRs) Order R5-2017-0019 (Order) to increase their permitted daily maximum discharge volume to the Lerdo Canal or Rosedale Spreading Basins, both of which are owned and operated by North Kern Water Storage District (North Kern or District). The Lerdo Canal is used to deliver water to irrigated agricultural uses, and to convey water for recharge to the District's groundwater spreading facilities, the Rosedale Spreading Basins, which are used for groundwater banking and recovery operations.

The focus of this report is on Califia's discharge to North Kern facilities with consideration of the various water sources in North Kern's conjunctive use program. Historically, water supplies transported in the Lerdo Canal were either from Kern River, the Friant-Kern Canal (FKC), or groundwater wells located within the District's service area. In 2015, the District implemented a drought relief project that partners with California Resources Corporation (CRC) to accept produced water into the Lerdo Canal and Rosedale Spreading Basins. In 2016, Califia's process water was also accepted with the expectation that Califia would reduce salinity in their process water.

GEI Consultants, Inc (GEI) assisted Califia in performing an assessment of salt loading in their discharge water. Based on recommendations from the study, Califia implemented several projects that collectively reduced salinity in their discharge water by more than 1,300 micro-Siemens per centimeter ( $\mu$ S/cm) of conductivity, approximately 394 parts per million (ppm) of sodium and approximately 79 ppm of chloride. Most recently, in late 2020, Califia converted their disinfection system from liquid sodium hypochlorite to chlorine dioxide, which is expected to further reduce sodium and conductivity. With these water quality improvements, increasing the discharge volume is not expected to have any negative impact on receiving water supplies. When compared against other supplies in the Lerdo Canal (refer to Table 1-1), salinity levels in Califia's discharge water algins with those of CRC (EC of 611  $\mu$ S/cm and chloride of 66 ppm) and local groundwater (EC of 2,057  $\mu$ S/cm and chloride of 380 ppm) as shown in Table 3-4 in Section 3.

Table 1-1. Salinity of Water Supplies in the Lerdo Canal

Water Source	EC (μS/cm)	Chloride (ppm)
Lerdo Canal <sup>1</sup>	511	65
Califia Farms	1,229	116

<sup>&</sup>lt;sup>1</sup>Represents water quality in the Lerdo Canal up to Califia's point of discharge.

Since the water supplies are blended in the Lerdo Canal, this report analyzes water quality with a blending framework to evaluate the potential for degradation. Data provided in this report primarily focus on Califia's facilities and evaluates potential impacts to receiving water in the Lerdo Canal with North Kern's current water supplies (Kern River, pumped groundwater, and CRC produced water). A comprehensive analysis of various blending scenarios demonstrates that increasing the volume of water that Califia discharges does not materially change water quality in the region.

# 1.1 Background

Califia Farms manufactures plant-based milks, yogurts, juices, and specialty coffee drinks from crops locally grown in the Central Valley. The Bakersfield manufacturing facility has been in operation since 2011 and is currently permitted to discharge 150,000 gpd, or 0.2 CFS. This RWD is to support increasing the permitted volume to a maximum of 500,000 gallons per day (or about 0.8 CFS). Because Califia has significantly reduced salinity in their discharge water, North Kern is willing to accept the increased volumes. Process water is discharged into the Lerdo Canal, which is directly adjacent to Califia's facility. The Canal is operated to meet irrigation demands, where the peak irrigation season generally ranges from March through August and system demand is lower during the fall and winter months.

#### 1.2 Existing Project and Proposed Discharge Volume

The existing project consists of recycling process water from Califia by discharging into the Lerdo Canal where it blends with irrigation supplies managed by North Kern. This project is beneficial because it provides Califia with a sustainable discharge solution and makes beneficial reuse of process water. Califia's process water is good quality but contains levels of electrical conductivity (EC) that exceeds state and regional discharge limits.

Water volumes in the Lerdo Canal fluctuate based on available water supplies and irrigation demand. On average, the Lerdo Canal moves approximately 109 CFS per day of irrigation water, which is made up of surface water supplies, pumped-in groundwater, and produced water from CRC. Water volumes vary based on several factors, predominately irrigation demands, and available surface water supplies conveyed for groundwater recharge. Califia is currently permitted to discharge a maximum of 0.2 CFS per day and proposes to increase their permitted capacity up to 0.8 CFS per day. Average volumes from each source in Lerdo Canal were derived from the following data sources: 2020 Kern River Annual Hydrographic Reports, CRC Self-Monitoring Reports Discharge 001, and District records of groundwater conveyed via the 8-1 Lateral Canal into the Lerdo Canal. To simplify the analysis, 2020 records are used to represent the various water supplies conveyed in the Lerdo Canal. Figure 1-1 is a flow schematic of the water supplies.

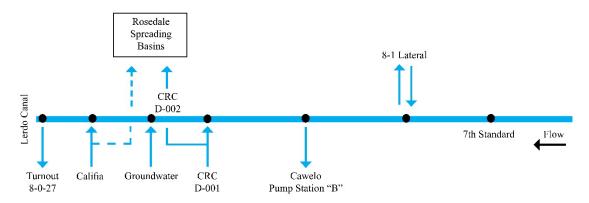


Figure 1-1. Lerdo Canal Flow Schematic

The Lerdo Canal receives Kern River water from the 7<sup>th</sup> Standard Weir. Groundwater is extracted from wells located around the Rosedale Spreading Basins and conveyed into the Lerdo Canal via the 8-1 Lateral. Produced water from CRC is introduced downstream of the 8-1 lateral and Pump Station B. There are also two adjacent groundwater wells that pump directly into the Lerdo Canal. Califia is the last discharge into the canal prior to the first point of use, which is Turnout 8-0-27, located approximately 0.3 miles downstream of Califia's discharge. Table 1-2 summarizes the average flow used in the analysis presented in this report.

Table 1-2. 2020 Average Flow of Water Sup	plies to the Ler	do Canal
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Source	Average (CFS)
Kern River from 7 <sup>th</sup> Standard Weir	83
Groundwater from 8-1 Lateral	23
CRC (D-001)	9.7
Groundwater from 2 adjacent wells	9.1
Califia (proposed volume)	0.8

If the Lerdo Canal is shutdown, Califia's water is discharged via truck (dotted line in Figure 1-1) and blended with North Kern's water, if any, and CRC's produced water in the Rosedale Spreading Basins for groundwater recharge. This process is only carried out when required by North Kern, which is rare and intermittent. Figure 0-1 provides a site map showing the Project Area including the 608-acre Rosedale Spreading Basins.

While multiple water sources supply the Lerdo Canal prior to Califia's discharge point, they are grouped together and collectively described as Lerdo Canal to focus this report on impacts of Califia's discharge. For this analysis, water quality samples were collected at the 7<sup>th</sup> Standard Weir, mass balance calculations are used to estimate water quality that represents blended water supplies that include the 8-1 lateral, CRC, and the two adjacent groundwater wells. The Lerdo Canal supplies and Califia's discharge are used in the blending framework to evaluate impacts of

Califia's discharge and demonstrate that all District and Basin water quality thresholds are met at the first point of use (8-0-27 turnout).

#### 1.3 California Environmental Quality Act

In April 2016, an Initial Study/Negative Declaration was completed and concluded that Califia's discharge project would not have measurable impacts to resources when combined with other similar projects, as the volume of water was comparatively small and therefore, blended water would easily meet the Regional Water Quality Control Board's (Regional Board) discharge requirements. With the increase in discharge volume, the Regional Board has determined that Califia's proposed discharge does not qualify for an exemption under §15263 of the CEQA Guidelines because it is a substantial increase and must be evaluated as a 'new' discharge. Consequently, a certified CEQA document is required for issuance of the Waste Discharge Requirements. North Kern is preparing a Draft Initial Study/Mitigated Negative Declaration and will serve as the lead CEQA agency.

#### 1.4 Regulatory History

Califia Farms originally disposed of process water by land application to a 525-acre site that is permitted under Sun Pacific Shippers, under Order 96-169 issued to Exeter Packers and Sun Pacific Shippers. After preparation of an RWD by GEI in 2016, Califia was issued a new permit, Order R5-2017-0019. This allowed Califia to discharge process water directly into the Lerdo Canal.

# 2. Description of Facilities and Surrounding Area

North Kern encompasses an area of approximately 60,000 acres in Kern County, northwest of Bakersfield, east of Shafter and Wasco, and west of McFarland. The District's fundamental purpose is to "build-up and maintain the groundwater storage underlying the District." This is accomplished though importing surface water and managing it conjunctively with the underlying groundwater. Their conjunctive use program allows for "wet year" water supplies to be distributed to approximately 1,700 acres of water spreading facilities (to the extent there is water available in excess to irrigation demand) and extracted as groundwater during "dry years" to meet irrigation demand. In 2015, treated produced water from CRC was added to North Kern's water supply portfolio under Order R5-2015-0127. In 2017, under Order R5-2017-0019, process water from Califia was added to North Kern's water supplies as well.

#### 2.1 Regional Water Supply and Quality

North Kern's strategy for managing water resources is based on availability of surface water supplies and irrigation demand. Water supplies vary substantially from year-to-year due to the inherent hydrologic variability of surface water supply. In 2020, the total water distributed throughout the District from the Lerdo Canal was approximately 71,745 acre-feet (AF): of this, 66,519 AF was used for irrigation and approximately 5,226 AF of Kern River water was discharged to the Rosedale Spreading Basins. Based on 2020 Self-Monitoring Reports, CRC directly delivered approximately 1,849 AF of produced water to the Rosedale Spreading Basins.

The volumes of various water supplies conveyed through the Lerdo Canal in 2020 are representative of an average water year. Kern River is the predominate source of supply, composing approximately 84-percent of the annual totals, whereas CRC deliveries to the Lerdo are approximately 10-percent and local groundwater is estimated at 6-percent.

# 2.1.1 Rosedale Spreading Basins

North Kern uses approximately 1,700 acres of spreading basins to recharge the underlying groundwater with available surface water supplies. The largest site is the 608-acre Rosedale Spreading Basins, bordered by the Calloway Canal to the north; orchards to the west; vineyards to the east; and a mixture of vineyards and cotton to the south. Lateral canals oriented in a north-south direction are used to distribute flows to the individual spreading basins which are formed by an extensive system of dikes. Manually operated gates are used to control the flow of water into individual basins.

CRC's produced water is discharged either into the Lerdo Canal or Rosedale Spreading Basins, as directed by North Kern. Discharge from CRC to the Rosedale Spreading Basin is via pipeline into

the two lateral canals: the 9-2 Canal and the 9-0-18 Canal. Surface water supplies, when available for recharge, are also distributed through these two lateral canals. Once in the laterals, canal drop structures cause the water to "pool" behind them. Pictures of these lateral canals are provided in Figures 2-1 and 2-2.

Califia will typically discharge directly to the Lerdo Canal; however, when directed by North Kern (typically because the canal is dry for maintenance), process water will be discharged via a 5,000-gallon water truck into the Rosedale Spreading Basins. Trucking water is a rare and intermittent operation.



Figure 2-1. Rosedale Spreading Basins Canal Laterals

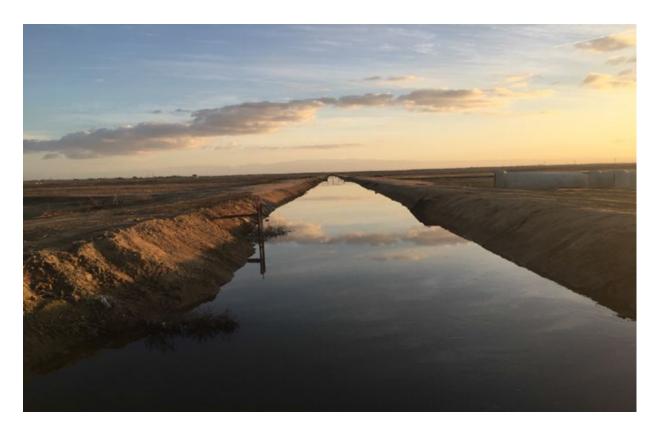


Figure 2-2. Rosedale Spreading Basin Canal Laterals

#### 2.2 Land Use

Most of the 60,000 acres within North Kern's boundaries are developed to irrigated agriculture, with a significant majority planted in permanent crops, including nuts, vineyards, and fruit. Annual crops consist mainly of deciduous fruits and nuts. Soils within North Kern can be categorized intro three types according to texture, which include: fine to coarse sand and gravel, fine textured soils, and medium- to coarse-textured soils. Approximately one-half of the soils within the North Kern are Wasco sandy loam soils, which cover large areas in the central and northern parts of the District's boundaries and are interspersed with other soil types. The next most prevalent soil type is McFarland loam, which is only present in the northern one-third of the District's boundaries. Soil in the southern one-third consists of many contiguous and non-contiguous areas of Lewkalb sandy loam, Milham sandy loam, Driver coarse sandy loam, and Kimberlina fine sandy loam interspersed with the Wasco sandy loam. Except for Lewkalb sandy loam, the other four soil types are present in the Rosedale Spreading Basins.

# 3. Water Quality

This section discusses Califia's discharge water quality as well as the various water sources supplying the Lerdo Canal and Rosedale Spreading Basins. Process water and treatment waste leaving Califia's facility is first screened to remove solids and then collected in a 700,000-gallon oxidation ditch (oxiditch), where it is aerated prior to discharge. The discharged water is recycled through the Lerdo Canal.

#### 3.1 Califia Farms

Figure 3-1 depicts Califia's water uses and the treatment processes that generate process water, which is discharged to the oxiditch and ultimately recycled to the Lerdo Canal. Well water is filtered through a catalytic granular activated carbon (GAC) system to oxidize dissolved sulfide and convert it to sulfate. The treated water is disinfected and stored in a 20,000-gallon Tiger Tank before entering Califia's plant through three separate processes depending on end use: 1) facility water used for cleaning and sterilizing throughout the facility; 2) filtered through membranes to further purify water used for product ingredient (only the membrane reject goes into the oxiditch); and 3) filtered through a water softener and used for the condenser (softener backwash and blowdown from the condenser are sent to the oxiditch). In addition to process water, well water is backflushed through the GAC weekly to fluff the carbon bed, which accounts for approximately 1.0 percent of process water to the oxiditch. The following points provide a brief summary of the volumes of each water use that is sent to the oxiditch:

- 1) From the Tiger Tank, approximately 322,500 gallons per day of well water is used in the facility to sanitize and sterilize equipment. This accounts for approximately 92.6 percent of the total process water to the oxiditch. Residual chemicals used for sanitation are carried with the water: all chemicals are National Sanitation Foundation (NSF) certified.
- 2) Product ingredient water is further treated through multi-media filters (MMF) to remove fine particles, GAC to remove chlorine, and nanofiltration (NF) to reduce mineral content. Reject water from this treatment process includes 0.1 percent of filter backwash from MMF and GAC and 6.9 percent of NF concentrate. Collectively, this accounts for 7 percent of the total process water to the oxiditch.
- 3) Condenser water is treated through a softener resin, which is regenerated on a timer. While water softener brine is a significant contribution to conductivity, it does not contribute to sodium since potassium chloride is now used to regenerate the resin. Brine from regeneration accounts for approximately 0.4 percent of the total process water to the oxiditch.

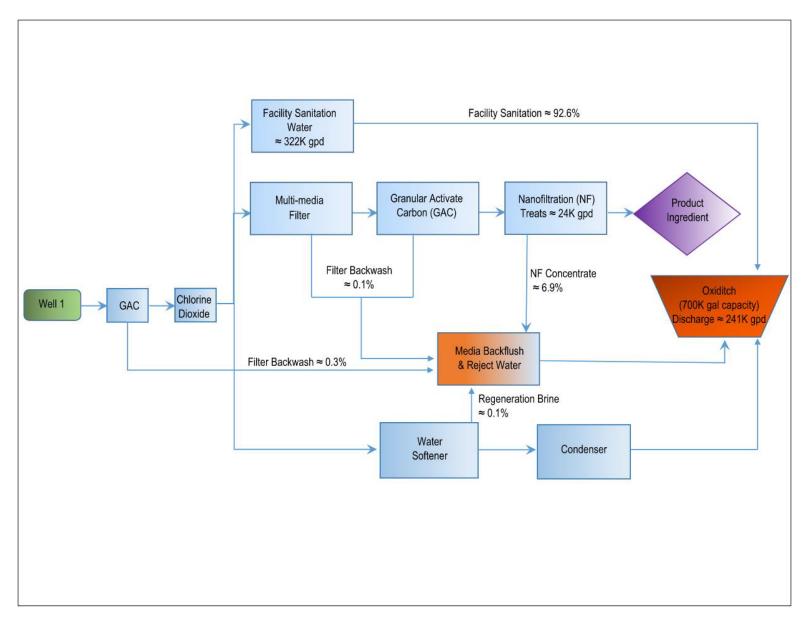


Figure 3-1. Califia Water Use and Treatment Process

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GEI Consultants, Inc.

#### 3.1.1 Process Water Quality Improvements

As previously described, various sources of process water and treatment waste streams are collected in the oxiditch (refer to Figure 3-1). Discharge water quality is good, except for elevated salinity. GEI evaluated sources of salinity and prepared a Salinity Management Plan (SMP) in 2019, which focused on conductivity, sodium, and chloride. Data on sodium reduction has been included in the following sections as it was evaluated under the SMP. Since there is no Basin Limit for sodium, and it is generally represented by conductivity, sodium is not presented elsewhere in this Report. Opportunities to reduce salinity included: replacing Califia's source water well with a better quality on-site well, changes in sulfide treatment process, and some chemical changes in the manufacturing process. Understanding that increasing salts is a concern for the Central Valley, and for North Kern, Califia has already implemented the alternatives predicted to significantly reduce their salt load. Results of these improvements are demonstrated by reduced concentrations in the oxiditch of conductivity (EC), sodium (Na), and chloride (Cl), which are presented over time graphically in Figure 3-2 and tabularly in Table 3-1.

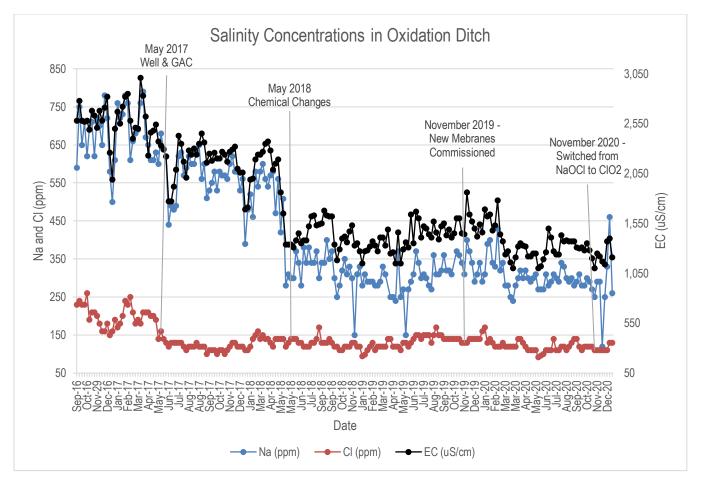


Figure 3-2. Salinity Concentrations in Oxidation Ditch

The first improvement, which came online in May 2017, was constructing a new well and changing their sulfide treatment method from chlorine oxidation to GAC. In May 2018, Califia replaced their caustic disinfectant used for plant sterilization with a product that contains less salts and started using potassium chloride to regenerate their water softener. These chemical changes significantly reduced conductivity and sodium but had minimal impact on chloride. To further reduce salt concentration and the volume of reject water, Califia replaced their reverse osmosis (RO) membranes with looser nanofiltration membranes in December 2019. In November 2020, the source water disinfectant was changed from sodium hypochlorite (NaOCl) to chlorine dioxide (ClO<sub>2</sub>), which further reduced conductivity and sodium in their discharge water. Before permanently switching, pilot testing had taken place from April through June of 2020. Conductivity levels slightly increased in June after switching back to NaOCl before permanently switching to the new disinfectant.

Cumulatively, these projects have resulted in reducing salinity by more than 1,300  $\mu$ S/cm of conductivity, approximately 394 ppm of sodium and approximately 79 ppm of chloride. Replacing RO with nanofiltration membranes reduced EC and chloride but had minimal impact on sodium. While only two months of data are available after replacing the primary disinfectants, salinity was further reduced by 10  $\mu$ S/cm, sodium by 25 ppm, and chloride by 5 ppm since October 2020.

Effects of the new membranes were not observed immediately. There was an increase in conductivity in mid-November 2019 when the new membranes were installed, which was caused by flushing the membranes to remove the sodium bi-sulfate preservative before they were put in service. Flushing was conducted in parallel to operation of the RO membranes and both processes were discharged to the oxiditch; consequently, conductivity levels were elevated. In mid-December 2019, the new nanofiltration membranes came on-line, and the RO membranes were removed from operation. Conductivity levels were expected to improve, however, there was a source water quality issue (temporary increase in sulfide) that created a high chlorine demand. Subsequently, salinity levels fluctuated as a result of increased doses of the primary disinfectant that was used to address the source water issue. After conducting a pilot test with chlorine dioxide (March – May 2020), disinfection equipment was upgraded to permanently replace sodium hypochlorite. Replacing the primary disinfectant further reduced conductivity by 10 μS/cm and sodium by 25 ppm.

Since there is some variation between the weekly sample results, salinity reduction for each process change is calculated as the average concentrations for the timeframe between changes. For example, average conductivity between May 2016 to May 2017 was 2,553  $\mu$ S/cm. The new well and GAC came online in late May 2017; from June 2017 through May 2018, the average conductivity was 2,103  $\mu$ S/cm; the calculated reduction is 450  $\mu$ S/cm. The total salinity reduction from these improvements are 1,324  $\mu$ S/cm in conductivity, 394 ppm in sodium, and 116 ppm in chloride. Water quality changes over the last four years are summarized in Table 3-1 below with a comparison against the Basin Plan water quality objectives. Although the Regional Board does not have an established limit for sodium, there is an agricultural goal of 69 ppm.

Table 3-1. Water Quality Changes in the Oxiditch

Constituent (unit)	Sept 2016 – May 2017	Well / GAC Jun 2017 – May 2018	Chemical Changes Jun 2018 – Dec 2019	Nanofiltration  Jan - Oct 2020	Disinfectant Change Nov - Dec 2020	Basin Plan Limits
Conductivity (µS/cm)	2,553	2,103	1,438	1,339	1,229	700
Sodium (ppm)	674	536	313	305	280	-
Chloride (ppm)	194	125	132	121	116	106

#### 3.1.2 Oxiditch Monitoring and Reporting

An auto sampler collects composite samples for routine water quality monitoring. As required in the current Order, the oxiditch is tested for general minerals annually and source water sampling is conducted quarterly. All sample results are reported to the Central Valley Regional Board with a quarterly self-monitoring report. Based on the data reviewed from the routine and annual monitoring, Califia's process water meets all state and regional water quality standards as well as North Kern's water quality thresholds, except for EC.

Water level in the oxiditch is controlled by a level sensor set for a minimum water level of 4-feet and maximum is 9-feet. The maximum water level always enables Califia to continuously maintain 2-feet of freeboard. A Human-Machine Interface (HMI) activates the discharge pump when the water level reaches 10-feet. Water discharged to the Lerdo Canal is metered prior to leaving Califia's property.

#### 3.2 Lerdo Canal

The Lerdo Canal is used to deliver blended surface water, groundwater, and produced water to irrigated agriculture within the District's boundaries. Water sources and flow are controlled by North Kern based on available surface water supplies and/or daily water orders from their landowners. Table 3-2 lists North Kern's water quality thresholds for the irrigation season as well as the flow-weighted average of surface water supplies and groundwater currently delivered to irrigation through the Canal prior to CRC discharge point (Figure 1-1).

Table 3-2. North Kern Water Quality Thresholds for Irrigation

Parameter	Average Value <sup>1</sup>	District Threshold
EC (µS/cm)	516	<650
Chloride (ppm)	65	<100

<sup>&</sup>lt;sup>1</sup>Calculated value of Lerdo Canal Water passing over the Weir at Pump Station B.

#### 3.3 Rosedale Spreading Basins

The 608-acre Rosedale Spreading Basins are an integral part of North Kern's conjunctive use program. Kern River water is the principal source of water for spreading, and a portion CRC's produced water is also spread. As a generalization, spreading occurs when available water supplies exceed demands. All spreading water, regardless of source, is discharged into the 9-2 and/or 9-0-18 lateral canals, from which water is then distributed and diverted into individual spreading ponds within the Rosedale Spreading Basins for percolation. Accordingly, the shared conveyance provided by the 9-2 and 9-0-18 lateral canals results in blending prior to discharge to an individual spreading pond. Similarly, Califia's process water would be discharged via water truck into the lateral canals and will blend with other sources of supply in the lateral canals.

In January of most years, the Lerdo Canal is drained for annual maintenance. During this period, all produced water is routed to the Rosedale Spreading Basins. Depending on where canal maintenance is needed, Califia's water may need to be trucked to the Rosedale Spreading Basins for up to two weeks (14 days).

## 3.4 Water Quality Blending

Blending calculations were prepared for multiple blending scenarios to evaluate the potential impact of Califia's increased discharge. This evaluation demonstrates that Califia's discharge water, when blended with Lerdo Canal's sources of supply, does not materially change the receiving water quality. Modeled water quality data is presented in this section to evaluate the impacts of increasing Califia's discharge volume from the current daily maximum of 150,000 gpd (0.2 CFS) to 500,000 gpd (0.8 CFS). Various scenarios are evaluated and provide estimated values based on average flow rates in Table 3-3 and the water quality values in Table 3-4. Recall, for the purpose of this report comingled water supplies prior to Califia's discharge are identified as Lerdo Canal to focus the analysis on impacts of Califia's discharge. The mass balance equation used for this modeling is shown below, where "V" equals volume and "C" equals concentration.

$$Modeled Lerdo Canal Water Quality = \frac{(V_1 \times C_1) + (V_2 \times C_2) + (V_3 \times C_3)}{V_{TOTAL}}$$

Table 3-3. Water Sources and Average Flows

Water Source	Range of Flow / Volume	Data Source
Lerdo Canal	109 CFS	2020 Records of Station B Average Daily Flows
CRC average to basins	1,849 AFY	2020 Hydrographic Report
Califia daily to Canal	0.2 CFS	2016 permitted value
Califia proposed maximum to Canal	0.8 CFS	Proposed volume of this RWD
Kern River water to basins	5,226 AFY	2020 Hydrographic Report
Califia Maximum Discharge to basins	22 AFY	14-days at proposed maximum

Table 3-4. Table of Water Quality Values Used in Blending Calculations

Water Source	EC (μS/cm)	Chloride (ppm)
Lerdo Canal (Station B Flows)	409	40
CRC Produced Water	611	66
Groundwater	2,057	380
Califia Farms	1,229	116
District Thresholds	<650	<100

Constituent values presented in Table 3-4 for the Lerdo Canal (Station B Flows) are referenced from the 2020 Kern River Annual Hydrographic Report, which is representative of average water year operations. Groundwater values represent a flow-weighted average using current data from the District's groundwater pump-in wells after the CRC discharge point in Figure 1-1. Califia's constituent values are based on an average of sample results from November through December 2020, which represent current discharge quality incorporating the most recent process improvements. As described in Section 3.2, this dataset is believed to represent Califia's current water quality conditions most accurately, as well as water quality going forward.

To quantify the potential impact from Califia's increased discharge, blending scenarios that consider irrigation's seasonal demand fluctuations and conjunctive use operations in the Canal were evaluated. These scenarios account for the instantaneous water quality and cumulative impact of Califia's discharge with all current water supplies at Califia's current and future flow rates.

Table 3-5 summarizes the results of modeled irrigation water quality; flow/volume of each source is included in the detailed tables in Appendix A. Historical water quality data has been submitted to the Regional Board in Califia's self-monitoring reports since the initial project was permitted in 2016.

Table 3-5. Modeled Lerdo Canal for Irrigation Water Quality

Lerdo Canal Blending	EC (μS/cm)	CI (ppm)
2020 average of all Lerdo Canal supplies, at 109 cfs	511	65
with Califia's discharge at 0.2 CFS	512	65
with proposed capacity of Califia at 0.8 CFS	516	65

In January of most years, the Lerdo Canal is drained for annual maintenance. During this period, all produced water is routed to the Rosedale Spreading Basins and North Kern may direct Califia to truck water. Under this scenario, it is assumed that the discharge to spreading consists of Kern River supplies, CRC produced water, and Califia's process water. Consequently, blending of these supplies have been evaluated separately from blending in the Lerdo Canal. Surface water is delivered via pipeline into North Kern's 9-2 and/ or 9-0-18 lateral canals. Califia's process water is discharged via a 5,000-gallon water truck into the lateral pools where it blends with other water supplies. Table 3-6 summarizes the results of modeled water quality considering both a flow-weighted and an annual average volume scenario; detailed calculations are included in Appendix A.

Table 3-6. Modeled Rosedale Spreading Basins Water Quality

Source	AFY	EC (µS/cm)	CI (ppm)
Kern River	5,226	201	5.7
CRC	1,849	432	7
Califia	22	1,229	116
BI	ended Water:	149	4

At Califia's currently permitted discharge of 150,000 gpd, or 6.44 AF over a 14-day period, conductivity of the blended waters is calculated to be 147  $\mu$ S/cm and chloride is calculated as 4 ppm. Increasing the volume of Califia's recycled water, does not materially change receiving water quality. This is largely due to the significant process improvements made to reduce salinity. With the current discharge quality and proposed volume, the proposed discharge can meet all state and regional policies and does not contribute to degrading water quality in the region. In each of the scenarios evaluated, the blended water quality meets all state and regional objectives.

# 4. Oxidation Ditch Design & Water Balance Analysis

The following sections provide an overview of Califia's oxiditch design and a water balance analysis. Given design features and a complete water balance analysis on daily inflow and outflow averages by month with representative precipitation data, Califia's oxiditch is not at risk of inundation or washout due to floods with a 100-year return frequency.

#### 4.1 Oxidation Ditch Design

Califia's oxiditch is designed, operated, and maintained to prevent inundation or washout due to flood with a 100-year return frequency. As discussed in Section 3, water leaving Califia's facility is screened to remove solids then collected in a 700,000-gallon oxiditch, where it is aerated prior to discharge. Level sensors are located at a height of 9-feet and control the on/off status of the discharge pump. Califia's water system is controlled through an HMI system. As the Oxiditch level rises, the discharge pump is triggered on and water is discharged to the Lerdo Canal. This mechanism prevents the oxiditch from overflowing, maintaining actual maximum capacity at approximately 600,000-gallons. Therefore, in the event of heavy rainfall, or excess inflow, oxiditch appurtenances will prevent water level from exceeding the regulated 2-feet of freeboard required under the Order.

Additionally, the outer rim of the Oxiditch is sloped away from the wastewater surface and the banks are approximately 5-feet above grade, which prevents inflow of runoff from the surrounding area into the Oxiditch. Instead, runoff is diverted to a separate stormwater basin located on Califia's property as shown in Figure 0-1.

# 4.2 Operation and Maintenance of Oxiditch

Califia operates and maintains the oxiditch in accordance with the Monitoring and Reporting Program (MRP) prescribed under their Order to demonstrate compliance with waste discharge requirements. Effluent flows (discharge) are monitored continuously through the HMI to prevent discharges from Califia's facility from exceeding the maximum capacity of the oxiditch. Additionally, permanent markers have been placed in the oxiditch, indicating the water level at design capacity and available operational freeboard. The oxiditch is visually inspected daily to observe freeboard compliance; measurements are conducted weekly.

Given that design parameters as well as operation and maintenance practices prevent overflow, the oxiditch has sufficient capacity to accommodate allowable wastewater inflow and seasonal precipitation as well as ancillary inflow and infiltration during the winter. A comparison of precipitation data with 2019 daily inflow and outflow averages by month data is discussed in Section 4.3, which indicates sufficient oxiditch capacity to prevent inundation or washout.

## 4.3 Water Balance Analysis

This water balance analysis accounts for all water inputs and outputs from the Califia facility to the oxiditch on a monthly basis using a daily average. The wastewater storage requirement is based on the maximum accumulation of wastewater in the oxiditch during a 100-year return period wet year. For the purpose of this analysis, precipitation data was collected from the nearest California Irrigation Management Information System (CIMIS) station to capture data representative of a flood with a 100-year return frequency. The Shafter CIMIS Station #5 is the closest station, located approximately 8 miles northwest of Califia's facility and has been collecting data since its construction in 1982. Data analysis concluded that December of 2010 was the month with the highest rainfall event since 1982 with a monthly total of 6 inches of precipitation. This monthly total is used in the water balance analysis of Califia's process water as represent a severe storm event (100-year storm).

To begin, average daily inflow and outflow data by month was collected from Califia's 2019 Self-Monitoring Reports to the Regional Board. Since Califia's productivity has annually increased since the Order, 2020 is representative current conditions. Below, Table 4-1 accounts for the daily average water inputs and outputs from the oxiditch monthly as well as the volumes for each month assuming a 6-inch rainfall event. It is assumed based on the design of the oxiditch that any additional volume from rainfall is due to the rainfall on the water surface.

Table 4-1. 2020 Average Inflow and Outflow Volumes with Precipitation

	Inflow to Oxiditch (gallons)		Outflow to Lerdo Canal (gallons)	
Month	Daily Average	Daily Average + Precipitation	Daily Average	Daily Average + Precipitation
January	308,569	338,214	219,633	249,278
February	296,424	326,069	199,353	228,998
March	322,926	352,571	223,346	252,991
April	353,000	382,645	238,128	267,773
May	376,000	405,645	247,495	277,140
June	352,000	381,645	182,667	212,312
July	369,000	398,645	255,263	284,908
August	385,000	414,645	342,578	372,223
September	351,000	380,645	278,973	308,618
October	364,046	393,691	214,629	244,274
November	356,993	386,638	240,429	270,074
December	344,151	373,796	249,569	279,214

Daily Average from Califia's 2020 Self-Monitoring Reports to the Regional Board based on 31 days/month.

<sup>&</sup>lt;sup>2</sup>Daily average and precipitation is the summation of process water and precipitation calculated using the surface area of the oxiditch and the December 2010 6-inch average monthly rainfall data from Shafter CIMIS Station #5.

In July 2020, the meter from the facility to the Oxiditch intermittently stuck at 800 gallons per minute, inaccurately indicating water was discharged for longer periods of time than the actual discharge. Therefore, false high volumes were reported for the months of August and September in Califia's quarterly self-monitoring reports to the Regional Board. The volumes shown in Table 4-1 are the assumed actual discharge volumes based on operation during that period.

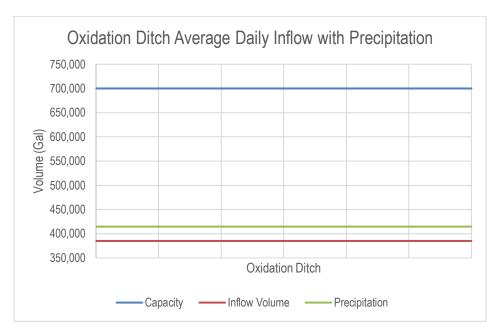


Figure 4-1. Oxidation Ditch Average Inflow with Precipitation

If a 100-year return period wet year were to occur, precipitation in the oxiditch would yield approximately 29,645 gallons of added volume. As displayed in Figure 4-1, the highest daily average inflow volume into the oxiditch with precipitation is 414,645 gallons. Given that the oxiditch has a maximum capacity of 700,000 gallons, there is sufficient capacity to store process wastewater during a 100-year return period wet year. Additionally, the highest daily average outflow to the Lerdo Canal would be approximately 372,220 gallons with the additional precipitation, which is well within the proposed maximum discharge volume of 500,000 gpd. Appendix Bincludes Califia's oxiditch design drawing for reference.

# 5. Antidegradation Analysis

Califia's proposal to increase their discharge maximum volume to 500,000 gpd requires an antidegradation analysis to evaluate the potential impacts to groundwater in the project area. Since Califia has made several improvements to reduce salinity in their discharge water, modeled water quality results demonstrate that the increased volume does not materially change the receiving water quality. This analysis has been limited to conductivity and chloride since those are the only constituents of concern in Califia's discharge.

#### 5.1 Analysis Approach

This analysis compares the range of blended discharge water quality with 1) current water quality; 2) background water quality values; and 3) regional water quality thresholds and objectives. The constituents in this analysis include conductivity and chloride. Since salinity is the only water quality concerns with Califia's discharge water, these are the only constituents included in this analysis and are compared against agricultural standards since that is the primary water use in the region.

#### 5.2 Results of Analysis

As discussed in Section 3, salinity (represented by conductivity in this section) within North Kern varies considerably between the various sources of supply. The Kern River has the lowest salinity; CRC has moderate salinity averaging around 611  $\mu$ S/cm of conductivity; Califia's discharge and local groundwater both exceed the basin limit of 700  $\mu$ S/cm. To normalize the impact of source variation, the constituents of concern were evaluated on both a flow-weighted and average annual basis.

#### 5.2.1 Lerdo Canal

Table 5-1 below shows a comparison of various blending scenarios to account for different combinations of current and future discharge volumes to the Lerdo Canal. As indicated in Section 1.2, sources of water in the Lerdo Canal can account for Kern River, local groundwater, and CRC produced water prior to Califia's discharge point. Irrigation water supply in the Lerdo Canal is of high quality. As demonstrated by modeled water quality, Califia's water with these sources does not degrade the high-quality irrigation water that North Kern distributes to its landowners as displayed below.

Table 5-1. Modeled Lerdo Canal for Irrigation Water Quality

Lerdo Canal Blending	EC (μS/cm)	CI (ppm)
2020 average for all Lerdo Canal supplies, at 109 CFS	511	65
with Califia's discharge at 0.2 CFS	512	65
with proposed capacity of Califia at 0.8 CFS	516	65

In Califia's proposed maximum of 500,000 gpd (0.8 CFS) scenario, conductivity is only increased by four units (i.e., average of EC increases from 511 to 516  $\mu$ S/cm). An increase is not observed in chloride since the concentrations are significantly lower and units of measure are significantly larger.

#### 5.2.2 Rosedale Spreading Basins

Water quality discharged to the Rosedale Spreading Basins is evaluated on both a flow-weighted and annual volume basis since Califia only discharges to the spreading grounds when directed by North Kern. Califia's water is blended with other produced water and other surface water supplies in the lateral canals. At a minimum, Califia's water discharge will be blended with other source waters containing lower dissolved salts. Modeled water quality presented in Table 3-6 shows there is no material change in water quality resulting from Califia's discharge.

Flow-weighted calculations were prepared for maximum discharge volumes. In this scenario, concentrations of conductivity and chloride are materially the same. Blended water concentrations meet state and regional limits as well as North Kern's agricultural thresholds.

# 5.3 Evaluation of the Proposed Project

State Water Resources Control Board Resolution No. 68-16 (Policy with respect to Maintaining High Quality Water of the State), commonly referred to as the Antidegradation Policy, requires that the Regional Board regulate discharges to maintain high quality waters of the state. Qualitative guidance provide that discharges shall be consistent with the maximum benefit to the people of the state, will not unreasonably affect present and anticipated beneficial uses, and will not result in water quality less than that prescribed by the state and regional objectives.

## 5.3.1 Rosedale Spreading Basins

The Water Quality Control Plan for the Tulare Lake Basin Plan designates beneficial uses of the Kern County Basin as industrial service supply; industrial process supply; municipal and domestic water supply; and agricultural supply. Both numerical and narrative objectives are identified to protect groundwater; the narrative objective states that "ground waters shall not contain chemical constituents in concentrations that adversely affect beneficial uses" (CRWQCB, 2020). Numerical objectives are applied to the water quality analysis in Section 3.

#### 5.3.1.1 Industrial Service Supply

Industrial service supply is defined in the Basin Plan as "uses of water for industrial activities that do not depend primarily on water quality..." Land application of the process water is not expected to affect beneficial uses of groundwater for industrial service supply and is not considered further in this analysis.

#### 5.3.1.2 Industrial Process Supply

Industrial process supply is defined as "uses of water for industrial activities that depend primarily on water quality..." which, in principle, is similar to protection of groundwater for municipal and domestic supply. This analysis is addressed in detail in the following section.

#### 5.3.1.3 Municipal and Domestic Supply

Numerical objectives with regard to protection of municipal and domestic water quality are specified in CCR, Title 22. Califia's discharge water is lower in salinity than groundwater in the middle aquifer (approximately 500 to 800 feet below ground surface) and is within the range of Title 22 secondary maximum contaminant level for conductivity. Blended water quality is well below the recommended levels of 700  $\mu$ S/cm for conductivity. Califia's process water meets all other primary and secondary drinking water standards. Table 5-2 below compares the average groundwater quality and blended water quality for conductivity with the Title 22 recommended ranges.

Average EC **Agricultural** EC Recommend Range<sup>2</sup> **Water Source** (µS/cm) Threshold<sup>1</sup> (µS/cm) 230 - 2,800700 Groundwater 900 - 1,600Califia Discharge 1,229 700 900 - 1,600Califia Blended 511 700 900 - 1,600

Table 5-2. Average Conductivity Levels

#### 5.3.1.4 Agricultural Supply

Agricultural water quality goals, published by the Food and Agriculture Organization of the United Nations in 1985, provide numerical objectives to protect agricultural water uses for irrigation of various crops and stock watering. Constituents at or below the thresholds established in the Agricultural Water Quality Goals are considered safe for all crops and therefore should not be limited for agricultural uses. For the purpose of this report, these criteria are used to translate the Basin Plan's narrative objectives (CRWQCB, 2020). The agricultural goal for EC is 700  $\mu$ S/cm. Blended water quality in both the Lerdo Canal and Rosedale Spreading Basins meet these objectives.

North Kern agricultural water quality thresholds.

<sup>&</sup>lt;sup>2</sup>Title 22 lower and upper recommended limits for conductivity.

## 5.4 Proposed Water Quality Objectives for the Project Area

Water quality objectives and thresholds for the project area are included in Section 3, Table 3-2 and are based on Basin Plan objectives. Since Califia's discharge volume is very small relative to the supplies in the Lerdo Canal and Rosedale Spreading Basins, this analysis is limited to any potentially negative effects directly contributed by Califia's discharge. As shown in Table 5-1, salinity levels in the Lerdo Canal only minimally increase with added Califia volume. At proposed volume of 500,000 gpd, Lerdo Canal water quality will show a change of 5  $\mu$ S/cm of conductivity with no change in chloride. While Califia's discharge volume is increasing, significant process changes have been made since the initial permit to reduce salinity. Conclusively, there is no material change to water quality in the Lerdo Canal.

## 5.5 Impacts on Groundwater Quality

Water quality modeling and analysis presented in this report provide an assessment of the potential for water quality degradation and/or impacts to the beneficial uses of the underlying groundwater within North Kern Water Storage District. Constituents of concern in Califia's process water are summarized in the following paragraphs:

• Salinity: Califia has implemented improvements to its operations which have resulted in significantly reducing the salt load from their discharge water. As shown in Section 3.2, Figure 3-1, conductivity, sodium and chloride have significantly decreased since May 2018 with the implementation of the new well and GAC treatment and process improvements developed through their SMP. While the current concentrations of EC and chloride exceed the Basin Plan limit of 700 μS/cm and 109 ppm, respectively. Blending effectively reduces concentrations to meet all state and basin water quality objectives, as well as North Kern water quality thresholds for agriculture.

Based on water quality information provided in this RWD for current sources of supply, Califia's proposed increase to 500,000 gpd to irrigation (via the Lerdo Canal) and Rosedale Spreading Basins has a negligible contribution towards increasing groundwater salinity over time.

## 5.6 Benefits of the Proposed Project

The benefit of this proposed increase in discharge volume is that it enables Califia to recycle their discharge water in a sustainable and environmentally responsible manner. Since the Kern Subbasin is designated as a critically overdrafted basin, returning 500,000 gpd, totaling up top 560 AFY, to the basin enables the water to be reused on the crops Califia uses in their plant-based products.

#### 5.7 Best Practical Treatment or Control

Neither the California Water Code nor the Antidegradation Policy explicitly define Best Practical Treatment or Control (BPTC). The Regional Board has considered BPTC to be the level of treatment and control technically achievable using best efforts. These efforts may include water conservation, recycling, and energy conservation. Key elements of Califia's BPTC include:

- Conservation efforts have been implemented to reduce water demand;
- Continued operational changes have improved discharge water quality and reduced conductivity and chloride values;
- Reuse of the water supply within the same basin that source water is extracted from; and
- Blending process water with the irrigation water supply to further reduce conductivity and chloride concentrations to meet the recommended agricultural thresholds.

# 6. Summary and Conclusions

This RWD describes the proposed permitted discharge volume of Califia's process water into the Lerdo Canal and/or Rosedale spreading basins from 150,000 gpd to 500,000 gpd. The discharge will recycle up to 560 AFY to the basin from which it is extracted and provide Califia with a continued sustainable and environmentally responsible discharge solution.

Water resources in the project area are managed by North Kern who provides irrigation water to approximately 60,000 acres of land. The primary sources of water brought into the project area include surface water, produced, and groundwater. During 2020, these sources of supply provide approximately 71,745 AFY throughout the District through the Lerdo Canal: 66,519 AFY for irrigation and approximately 5,226 AFY is discharged to the Rosedale Spreading Basins. Water supplies in excess of irrigation demand are discharged to one of North Kern's spreading basins for groundwater recharge. Califia will continue to primarily discharge to the Lerdo Canal but may temporarily discharge into two lateral canals via truck, which distribute water within the Rosedale Spreading Basins when the Lerdo Canal is dry for annual maintenance (14-day period).

Califia's process water, when blended with Lerdo Canal supplies, has no material impact on water quality. As shown in Table 6-1, blended Canal water and recharge waters meet all state and regional water quality objectives as well as North Kern water quality thresholds for agriculture.

Table 6-1. Summary of Blended Water Quality with Califia Buildout

Water Source	EC (μS/cm)	CI (ppm)
Lerdo Canal Water Quality	516	65
Rosedale Spreading Basins Water Quality	149	4
North Kern Water Quality Thresholds	650	100

## References

- Califia Farms Form 200 VI Other Required Information. Submitted to the California Regional Water Quality Control Board, Central Valley Region. 2 September 2014.
- California Regional Water Quality Control Board, Central Valley Region. *Water Quality Control Plan for the Tulare Lake Basin, Third Edition*. Revised May 2018 (with approved amendments). Sacramento, CA. 2018.
- California Regional Water Quality Control Board, Central Valley Region. Waste Discharge Requirements, For California Resources Corporation and North Kern Water Storage District Order R5-2015-0127. 2015.
- California Regional Water Quality Control Board, Central Valley Region. Resolution R5-2020-0057 Revisions to the Amendments to the Water Quality Control Plans for the Sacramento and San Joaquin River Basins and the Tulare Lake Basin. 2020.
- California Environmental Quality Act. CEQA Statutes and Guidelines. 2014.
- CCR, the California Environmental Quality Act. California Code of Regulations (CCR) Title 14 §15282. Other Statutory Exemptions.
- Kern River Annual Hydrographic Report. 2020.
- State Water Resources Control Board. January 2016. A Compilation of Water Quality Goals, 17<sup>th</sup> Edition. Sacramento, CA.

# Appendix A

Blending Calculations

# **Modeled Water Quality**

#### At Pump Station B

Source	CFS	EC	Cl
Kern River	83	201	5.7
Groundwater (8-1 Lateral)	23	1,161	162
	Blended Water:	409	40

#### With CRC & GW N/o Pump Station B

Source	CFS	EC	Cl
Lerdo Canal (Station B Flows)	90	409	39.6
CRC	9.7	611	66
Groundwater	9.1	2,057	380
	Blended Water:	511	65

#### With Califia Discharge at 150K.gal Per Day

Source	CFS	EC	Cl
Lerdo Canal	109	511	65
Califia (150k. Gal)	0.2	1,229	116
	Blended Water:	512	65

#### With Califia Discharge at 500k.gal Per Day

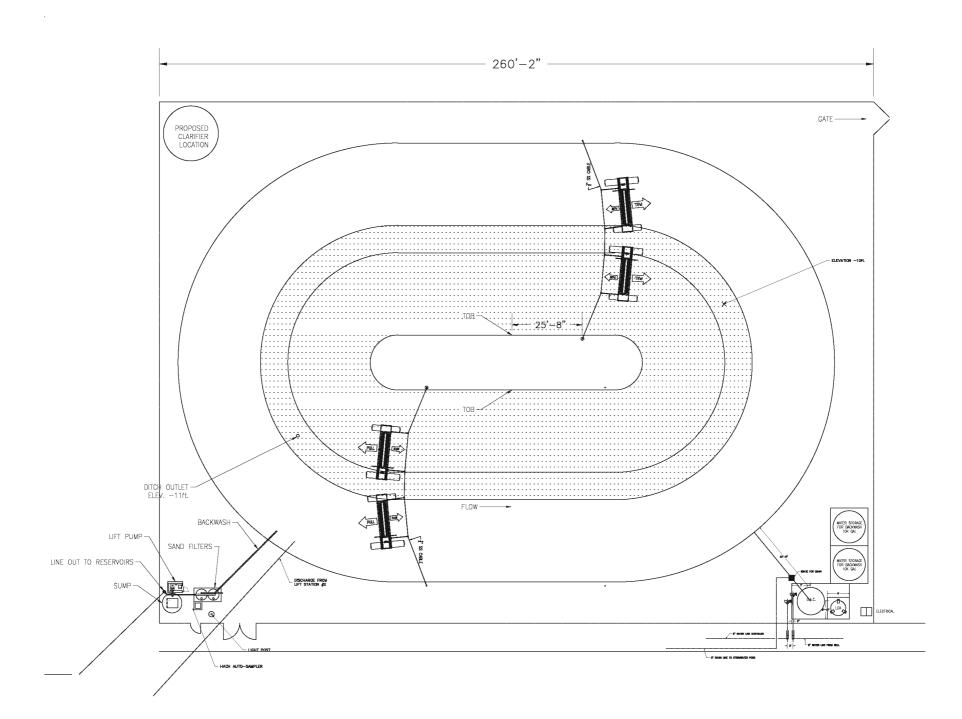
Source	CFS	EC	Cl
Lerdo Canal	109	511	65
Califia (500k. Gal)	0.8	1,229	116
	Blended Water:	516	65

# To Rosedale Spreading Grounds (2020 volumes for KR and CRC)

Source	AFY	EC	CI
Kern River	4,860	201	5.7
CRC	1,849	432	7
Califia	22	1,229	116
	Blended Water:	149	4

# Appendix B

Oxidation Ditch Designs



# **Appendix C**

Form 200





# State of California Regional Water Quality Control Board

# APPLICATION/REPORT OF WASTE DISCHARGE GENERAL INFORMATION FORM FOR WASTE DISCHARGE REQUIREMENTS OR NPDES PERMIT

## I. FACILITY INFORMATION

A. FACILITY:
Name Califia Farms, LLC
Address 33502 Lerdo Highway
City/County/State/Zip Code Bakersfield, Kern County, CA, 93308
Contact Person Steve Fernandez, Plant Manager
Telephone Number 612-490-4598 Email stevef@califiafarms.com
B. FACILITY OWNER:
Name Califia Farms, LLC
Address 1321 Palmetto Street
City/State/Zip Code Los Angeles, CA 90013
Contact Person Duane Eichelberger
Telephone Number 206-454-9605 Email duanee@califiafarms.com
Federal Tax ID 27-3471410
Owner Type (Mark one):
☐ Individual ☐ Corporation ☐ Governmental Agency ☐ Partnership
✓ Other:
C. FACILITY OPERATOR (The agency or business, not the person):
Name Califia Farms, LLC
Address 33502 Lerdo Highway
City/State/Zip Code Bakersfield, CA 93308
Contact Person Steve Fernandez
Telephone Number 612-490-4598 Email stevef@califiafarms.com
Operator Type (Mark one):
Individual Corporation Governmental Agency Partnership
Other:

D. OWNER OF THE LAND	
Name North Kern Water Storage District	
Address 33380 Cawelo Avenue	
City/State/Zip Code Bakersfield, CA 93308	
Contact Person Richard Diamond	
Telephone Number 661-393-2696	Email rdiamond@northkernwsd.com
Owner Type ( <i>Mark one</i> ):  ☐ Individual ☐ Corporation ☐ Go ☐ Other: Public Agency	overnmental Agency Partnership
E. ADDRESS WHERE LEGAL NOTICE M.	AY BE SERVED
Address 33502 Lerdo Highway	
City/State/Zip Code Bakersfield, CA 93308	
Contact Person Steve Fernandez	
Telephone Number 612-490-4598	Email stevef@califiafarms.com
F. BILLING ADDRESS	
Address 33502 Lerdo Highway	
City/State/Zip Code Bakersfield, CA 93308	
Contact Person Juan Fajardo, Director Operations Fin	ance
Telephone Number 661-615-5563	Email juanf@califiafarms.com
II. TYPE OF DISCHARGE	
Check Type of Discharge(s) Described in the	nis Application:
✓ Waste Discharge to Land	☐ Waste Discharge to Surface Water
Check all that apply:	
Animal or Aquacultural Wastewater	Land Treatment Unit
Animal Waste Solids	Landfill (see instructions)
Biosolids/Residual	Mining
☐Cooling Water	Storm Water
Domestic/ Municipal Wastewater Treatment and Disposal	Surface Impoundment
☐Dredge Material Disposal	☐Waste Pile
Hazardous Waste (see instructions)	Wastewater Reclamation
✓ Industrial Process Wastewater	Other, please describe

# III. LOCATION OF THE FACILITY

Describe the physical location of the facility:

. Assessor's Parcel Number(s)
Facility: 091310-029
Discharge Point: multiple parcels
2. Latitude
Facility: Lerdo Canal
Discharge Point: 35°30'02.62"N
3. Longitude
Facility: Lerdo Canal
Discharge Point: -119°08'34.34"W
V. <u>REASON FOR FILING</u>
Check all that apply:
☐ New Discharge or Facility
☐ Change in Design or Operation
☑ Change in Quantity/Type of Discharge
Changes in Ownership/Operator (see instructions)
Waste Discharge Requirements Update or NPDES Permit Reissuance
Other:
/. CALIFORNIA ENVIRONMENTAL QUALITY ACT (CEQA)
Name of Lead Agency North Kern Water Storage District
las a public agency determined that the proposed project is exempt from CEQA?
☐ Yes ✓ No
f yes, state the basis for the exemption and the name of the agency supplying the exemption on the line below:
Has a "Notice of Determination" been filed under CEQA?  ☐ Yes
f Yes, enclose a copy of the CEQA document, Environmental Impact Report (EIR), or Negative Declaration. If No, identify the expected type of CEQA document and expected date of completion.
Expected CEQA Documents:
Expected CEQA Completion Date: March 2021

#### VI. OTHER REQUIRED INFORMATION

Please provide a COMPLETE characterization of your discharge. A complete characterization includes, but is not limited to, design and actual flows, a list of constituents and the discharge concentration of each constituent, a list of other appropriate waste discharge characteristics, a description and schematic drawing of all treatment processes, a description of any Best Management Practices (BMPs) used, and a description of disposal methods.

Also include a site map showing the location of the facility and, if you are submitting this application for an NPDES permit, identify the surface water to which you propose to discharge. Please try to limit your maps to a scale of 1:24,000 (7.5' USGS Quadrangle) or a street map, if more appropriate.

VII.	OT	HER
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Attach additional sheets attachments with titles a		onses which need clar	ification. List
You will be notified by a application. The notice ware must sulpursuant to Division 7, S	vill state if your appli bmit to complete you	cation is complete or i ir Application/Report c	f there is additional of Waste Discharge,
VIII. CERTIFICATION			
I certify under penalty of supplemental information accordance with a system and evaluated the inform who manage the system information, the information accurate, and complete. Talse information, including	n, were prepared un m designed to assur nation submitted. Ba n, or those persons d ion submitted is, to t I am aware that the	der my direction and some that qualified person sed on my inquiry of the irectly responsible for the best of my knowled are significant pena	supervision in nnel properly gathered ne person or persons gathering the dge and belief, true, Ities for submitting
Print Name Steve Fernan	dez	Title Plant N  Date 2-8	Manager 7-202 (
FOR OFFICE USE ONL	Υ		
Date Form 200 Received:	Letter to Discharger:	Fee Amount Received:	Check #:

#### Exhibit "B"

# BEFORE THE BOARD OF DIRECTORS OF THE NORTH KERN WATER STORAGE DISTRICT

RESOLUTION NO. 21-xx

#### IN THE MATTER OF:

ADOPTION OF INITIAL STUDY/NEGATIVE DECLARATION FOR THE NORTH KERN WATER STORAGE DISTRICT, CALIFIA FARMS RECYCLED WATER PROJECT

#### **AND**

# APPROVAL OF THE NORTH KERN WATER STORAGE DISTRICT, CALIFIA FARMS PROCESS RECYCLED WATER PROJECT

#### **RECITALS:**

WHEREAS, pursuant to the requirements of the California Environmental Quality Act, California Public Resources Code section 21000 et seq. ("CEQA"), the North Kern Water Storage District ("District") has caused to be prepared and noticed and provided for public review and comment an "Initial Study/Negative Declaration," dated April 2021 which evaluates the potential environmental effects of the proposed "North Kern Water Storage District – Califia Farms Recycled Water Project" ("Project"); and

**WHEREAS**, the Project proposes to increase the permitted volume of recycled water discharged to the Lerdo Canal to a maximum of 500,000 gallons per day (or 560-acre feet per year) conveyed through an existing pipe and outfall along the Lerdo Highway right-of-way; and

**WHEREAS**, the District is the lead agency and its Board of Directors is the decision-making body for the Project; and

WHEREAS, in accordance with CEQA (Public Resources Code § 21092.3) and state CEQA Guidelines (14 Cal Code Regs § 15072), the District caused a Notice of Intent to adopt an Initial Study/Negative Declaration (IS/ND) for the Project to be, among other things: (a) published in a newspaper of general circulation in the area affected by the Project, The Bakersfield Californian, on April 30, 2021; (b) electronically delivered to other public agencies (Arvin Edison Water Storage District, Belridge Water Storage District, Berrenda Mesa Water District, Buena Vista Water Storage District, Castaic Lake Water Agency, Cawelo Water District, City of Bakersfield, City of McFarland, City of Shafter, City of Wasco, County of Kern, Delano-Earlimart Irrigation District, Henry Miller Water District, Irvine Ranch Water District, Kern County Water Agency, Kern Delta Water District, Kern Groundwater Agency, Kern Water Bank Authority, Kern-Tulare Water District, Lost Hills Water District, Lost Hills Utility District, Rosedale-Rio Bravo Water Storage District, Semitropic Water Storage District, Shafter-Wasco Irrigation District, Southern San Joaquin Municipal Water District, West Kern Water District,

#### Exhibit "B"

and Wheeler Ridge-Maricopa Water Storage District) on April 30, 2021; (c) electronically filed the IS/ND with the State Clearinghouse, for distribution to state agencies on April 29, 2021; and

**WHEREAS**, in connection with the approval of a project involving the preparation of an Initial Study/Negative Declaration that concludes this project has no significant impact on the environment; and

**WHEREAS**, the District provided members of the public with the opportunity to review and comment on the IS/ND for a period of at least 30 days as required by CEQA, and the District received no comments on the IS/ND before the close of the public comment period on June 1, 2021; and

WHEREAS, no revisions were made to the IS/ND; and

**WHEREAS**, the District's staff and CEQA consultants have determined that no information has arisen or revision was made since preparation of the IS/ND that warrants a change in its conclusions, and that recirculation is not required by CEQA (e.g., 14 Cal. Code Regs § 15073.5); and

**WHEREAS**, the District exercised overall control and direction over the CEQA review process for the Project and, before considering whether to approve or otherwise act on the Project, the District's Board of Directors independently reviewed and considered the information contained in the IS/ND and other pertinent information, as required by CEQA; and

**WHEREAS**, the IS/ND are incorporated herein by this reference and made a part of this Resolution, as if fully set forth herein; and

#### NOW, THEREFORE, BE IT RESOLVED by this Board of Directors as follows:

- 1. That the foregoing recitals, and each of them, are true and correct.
- 2. That this Board of Directors does hereby make the following findings: (a) it has independently reviewed and analyzed the Initial Study/Negative Declaration and Project, and considered other information in the record as required by CEQA, prior to considering whether to approve or otherwise act on the Project; (b) the Initial Study/Negative Declaration have been completed in compliance with CEQA and consistent with state and local guidelines implementing CEQA; (c) the Initial Study/Negative Declaration represents the independent judgment and analysis of the District as lead agency for the Project; and (d) there is no substantial evidence in the record before it that the Project may or will have a significant effect on the environment; and
- 3. That the Initial Study/Negative Declaration described therein, is approved and adopted; and
- 4. That the District's North Kern Water Storage District, Califia Farms Recycled Water Project is hereby approved; and

#### Exhibit "B"

- 5. That the documents and other materials that constitute the record of proceedings for the Project, including the Initial Study/Negative Declaration are on file and available for review at the District's office located at 33380 Cawelo Avenue, Bakersfield, California 93308, and the custodian of records is Ram Venkatesan, Deputy General Manager; and
- 6. That the District's staff, consultants or legal counsel shall cause to be prepared and filed a Notice of Determination (NOD) with respect to the foregoing as required by CEQA, and are authorized to pay the fees and costs associated with filing the NOD on behalf of the District.

Said Resolution was adopted, on roll call, by the following vote:

**AYES:** 

NOES: None

ABSENT: None

ABSTAIN: None

I HEREBY CERTIFY that the foregoing resolution is the resolution of said District as duly passed and adopted by said Board of Directors on the 15<sup>th</sup> day of June, 2021.

WITNESS my hand and seal of said Board of Directors on the 15th day of June, 2021.

Secretary of the Board of Directors

[District Seal]

SUBJECT: North Kern Water Storage District Califia Farms Recycled Water Project

PROJECT DESCRIPTION: Califia Farms, LLC manufactures plant-based milks, yogurts, juices, and specialty coffee drinks from crops locally grown in the Central Valley. Califia Farms proposes to increase their discharge of recycled water to a maximum of 500,000 gallons per

day (or approximately 560 acre feet per year). Recycled water would continue to be discharged to either the Lerdo Canal or Rosedale Spreading Basins, both of which are owned and operated

NOTICE IS HEREBY GIVEN that North Kern Water Storage District intends to adopt a Negative Declaration under the California Environmental Quality Act regarding the following

by the North Kern Water Storage District.

PROPOSED MITIGATED NEGATIVE DECLARATION: North Kern Water Storage District is the Lead Agency for the Project and has prepared an Initial Study as required under the California Environmental Quality Act. As the Lead Agency, North Kern Water Storage District has evaluated the environmental effects of the Project and proposes a Negative Declaration (i.e., no environmentally significant effect and no mitigation measures). The Initial Study 'Proposed

Avenue, Bakersfield, ĈA 93308 or online: https://www.northkernwsd.com/environmental-documents/.

COMMENTS: Comments on the Initial Study / Proposed Negative Declaration should be mailed to Ram Venkatesan, Deputy General Manager, North Kern Water Storage District, 33380

Negative Declaration is available for inspection at the District's office at 33380 Cawelo

to Ram Venkatesan, Deputy General Manager, North Kern Water Storage District, 33380 Cawelo Avenue, Bakersfield, CA 93308 or emailed to ram@northkernwsd.com. The review/comment period begins on the date of this notice and expires on May 31, 2021.

April 30, 2021 14777806

matter.

#### EXHIBIT "D"

No	otice of Determination	on	Appendix D
To:  Office of Planning and Research  U.S. Mail: Street Ad		rch Street Address:	From: Public Agency:Address:
	P.O. Box 3044 1400 Te Sacramento, CA 95812-3044 Sacrame	1400 Tenth St., Rm 113 Sacramento, CA 95814	Contact:Phone:
	County Clerk County of:		Lead Agency (if different from above):
	Address:		Address:
			Contact:Phone:
	BJECT: Filing of Notice of L sources Code.	Determination in compli	ance with Section 21108 or 21152 of the Public
Sta	te Clearinghouse Number (if	submitted to State Cleari	nghouse):
Pro	ject Title:		
Pro	ject Description:		
Thi	s is to advise that the(	☐ Lead Agency or ☐ Re	has approved the above esponsible Agency)
	scribed project on(date scribed project.		e following determinations regarding the above
1. 7 2. [ 3. M 4. A 5. A 6. F	The project [ will will will not will make the project will will make the will will make the will ma	Report was prepared for to see prepared for this project were not] made a contoring plan [ was was derations [ was to the part with comments and response properties of the part with the part w	his project pursuant to the provisions of CEQA. It pursuant to the provisions of CEQA. Indition of the approval of the project. It pursuant to the provisions of CEQA. Indition of the approval of the project. It provisions of CEQA. It provisions of CEQA. It provisions of CEQA.
Sig	nature (Public Agency):		Title:
Dat	te:	Date Rece	ived for filing at OPR:

# NORTH KERN WATER STORAGE DISTRCT Board Meeting

Agenda Item 6D





# Proposal for North Kern Water Storage District

June 3<sup>rd</sup>, 2021

White Pine Renewables 4460 W Shaw Avenue Fresno, CA 93722 (559) 376-2070 www.WhitePineRenew.com



Confidential



June 3<sup>rd</sup>, 2021

Angel Ventura Staff Engineer North Kern Water Storage District 33380 Cawelo Extended Bakersfield, CA 93308

Mr. Ventura,

Thank you for the opportunity to bid on the North Kern Water Storage District (NKWSD) PV Project. This updated proposal package summarizes options for NKWSD to realize significant energy savings through a solar Power Purchase Agreement (PPA) and contains three options: **1.** Solar PV for NKWSD's seven deep well meters on the retention ponds, aggregated into a Net Metering Aggregation (NEMA) arrangement (explained further below); **2.** Solar PV for a selection of 50 of all of NKWSD's 122 meters, aggregated into a Renewable Energy System Bill Credit Transfer (RES-BCT) arrangement (explained further below); and **3.** Two separate RES-BCT arrangements, each including 50 meters from NKWSD. Each option aims to maximize your potential electricity bill savings. Please see the summary table below for an overview of the proposed options:

PPA Project Summary						
Net Metering Agg. Renewable Energy Bill Credit 2x RES-BCT Solar PV  (NEMA) Solar PV Transfer (RES-BCT) Solar PV						
PV System Size	2,210 kW <sub>DC</sub> Solar PV	7,000 kW <sub>DC</sub> Solar PV	14,000 kW <sub>DC</sub> Solar PV			
Target Online Date	4Q22	4Q22	4Q22			
PPA Rate, Year 1	\$0.085/kWh	\$0.076/kWh	\$0.076/kWh			
PPA Term	25 Years	25 Years	25 Years			
PPA Escalator	0%	0%	0%			
PPA Savings, Year 1	\$128,525	\$424,067	\$846,510			
Total Savings over 25 Years	\$10,958,515	\$33,466,488	\$66,804,814			

I would like to thank you for your time, consideration, and interest in White Pine Renewables. We are excited for the opportunity to work with North Kern Water Storage District, and we look forward to earning your trust and confidence as a long-term partner. Please don't hesitate to contact me with any questions.

Dylan Dupre
President
White Pine Renewables
(559) 376-2070
dylan@whitepinerenew.com



#### **Project Overview**

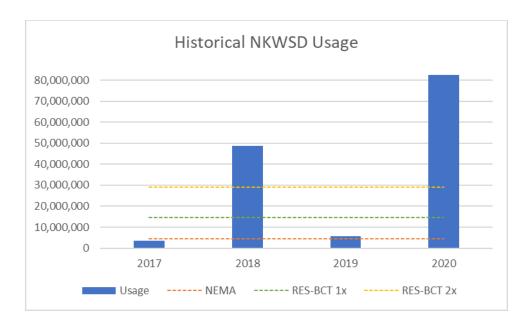
The table below summarizes the proposed single-axis tracker system(s) designed for North Kern Water Storage District by White Pine Renewables.

Location Summary					
PV System Location	35.46293, -119.16270				
Array Acreage	12 acres	36 acres	70 acres		
County/Utility		Kern County / PG&E			
<b>System Performance Summary</b>					
System Size	2,210 kW <sub>DC</sub>	7,000 kW <sub>DC</sub>	14,000 kW <sub>DC</sub>		
System Energy Generation (Yr 1)	4,590,170 kWh 14,623,000 kWh 29,190,000 kWl				
Total NKWSD Usage 2020	82,498,566 kWh				
Savings Summary	NEMA	RES-BCT	2x RES-BCT		
PG&E Utility Bill Savings (Yr 1)	\$518,689	\$1,535,415	\$3,064,950		
PG&E Utility Bill Savings (Yr 1-25)	\$20,149,209	\$59,645,348	\$119,062,222		
Cost per kWh with PG&E	\$.113/kWh	\$.105/kWh	\$.105/kWh		
Cost per kWh with PPA	\$0.085/kWh	\$0.076/kWh	\$0.076/kWh		
1 <sup>st</sup> Year Savings with PPA	\$128,525	\$424,067	\$846,510		
25 Year Cumulative Savings with PPA	\$10,958,515	\$33,466,488	\$66,804,814		

#### **Analysis**

White Pine was given four years of interval usage data (2017-2020) from PG&E in order to do the solar PV project analysis for North Kern Water Storage District. The data received contained monthly kWh usage for the past 48 months for 122 meters on NKWSD's property. These 122 meters varied widely in their usage, not only between meters but also between years. In analyzing the data there was a clear pattern of variability in usage over wet years and dry years (see figure below: bars are NKWSD usage, dashed lines are proposed PV generation for different project options above). Having four complete years of data was crucial in not only exposing this pattern but informing the best PV project solutions possible for NKWSD to realize significant energy savings.





From above, we can see that NKWSD uses energy much differently depending on the precipitation of a given year, with dry years like 2020 maxing out usage at 80,000,000+ kWhs and wetter years like 2017 bottoming out at 3,600,000 kWh. The usage across meters also varies significantly, but a common theme across the majority of the 122 meters is the seasonal differences in usage. As may not be surprising, usage peaks during the dry summer months and drops to almost nothing in the winter when rain is more plentiful. This lines up well with solar production, which also generates the most during the summer months and comparatively less in winter, meaning more aligned generation and usage profiles which means more savings for NKWSD.

Given the high variability of the usage data shown above, a 'typical' solar solution of sizing to ~100% of usage is not appropriate here, as it would leave NKWSD with significant PPA payments above electric bill savings during wet years with low usage. The answer we were trying to solve for, then, is how to realize significant electric bill savings at a competitive PPA rate (in essence sizing the system to dry years with high usage) while also reducing the hit on those years when usage dips due to increased precipitation. The three options below were sized to strike that balance. Not only do all three options offer maximum savings through a very competitive PPA rate, but each PPA is structured as flat—the rate will not change over the next 25 years—which not only means significant savings as utility rates continue to climb (at an average of 4% per year) but also a robust energy procurement strategy for NKWSD which will be able to better adapt to the year-to-year variability in usage.

#### **Project Option 1: Solar PV NEMA**

The first proposed option involves a subset of the 122 total NKWSD meters that are located on-site at the retention ponds where the project will be constructed. There are a total of 7 meters here, which in 2020 used a combined 4,955,333 kWh of electricity. Because these meters are located on-site and next to each other, this project option is able to take advantage of a program offered by PG&E called Net Energy Metering Aggregation (NEMA). There's a lot more detail on the program and how savings are calculated below, but in essence the per kWh savings offered by this particular program are more valuable on a per unit basis than the other two options (\$.113/kWh vs. \$.105/kWh on RES-BCT options), even though the project itself is a smaller size. The solar PV system designed for this option was sized so that it offsets ~90% of those 7 deep well meters using 2020 usage data.



#### Project Options 2 & 3: Solar PV RES-BCT and RES-BCT 2x

The second and third project options make use of a different program offered by PG&E exclusively for public agencies called RES-BCT. More detail on this program can be found below. For each of these project options, there is a limit of 5MWac per RES-BCT Arrangement which we have sized to 7MWdc of solar PV. Each 7MWdc project generates ~15,000,000 kWh annually, so for our two options we've included one RES-BCT arrangement totaling 7MWdc and two RES-BCT arrangements totaling 14MWdc. Both of these systems strike the balance above of realizing significant savings for NKWSD while also being sized well below 100% of dry-year usage in order to provide a buffer for lower usage wet years. The maximum the 14MW system will produce is ~30,000,000 kWh, which is only 37% of NKWSD's 2020 usage. To further buffer against the variability of dry and wet years, each RES-BCT Arrangement is allowed to include up to 50 meters within NKWSD's boundary of 122. When we select these meters, we will choose the highest 50 in terms of overall usage (or 100 in the case of RES-BCT 2x) to go into the Arrangement, thus limiting the year-to-year variability because of these larger, more consistent meters.



#### Why a Solar PPA?

Many businesses, municipalities, and non-profits are interested in installing solar but are restricted by upfront or ongoing maintenance costs. While purchasing a system outright or leasing are sometimes options, they require either a large upfront payment or large monthly payment, neither of which is an attractive option to those looking to cut costs immediately.

There are many advantages to go solar with a White Pine Renewable's PPA. There are no upfront capital costs, no installation costs, and White Pine Renewable's assumes all long-term responsibility for operations, maintenance, and system removal. With a White Pine PPA, you host the solar system on your land that you own or lease. You pay only for the electricity the system generates, at an established price lower than what you're paying for energy today.

#### **Advantages of a Power Purchase Agreement**

**Immediate Savings:** The instant your system is energized, you start saving money on your electricity bill. In addition, PPAs can increase your savings over time as grid electricity prices rise faster than your PPA rate.

Pay Only for the Energy Your System Produces: With a PPA, if your system doesn't perform, you don't pay. You buy the electricity that is produced at a guaranteed low rate every month.

**Predictable Long-Term Costs:** Commercial utility rates are increasing every year. In California, electricity rates increase faster than any other state in the nation. With a PPA you get long-term predictability and a hedge against PG&E's annual increase in electricity costs for the next 25 years or more.

**No Maintenance Costs or Worry:** As a food processor and packager, you have a lot of equipment to maintain. White Pine Renewables will maintain the system and will have a vested financial interest in making sure the system runs efficiently.

**Off-Balance Sheet:** If you are not in a position to take advantage of tax incentives, a PPA is an efficient way to reduce your energy costs without an impact to your balance sheet. A PPA is not a loan; it is a long-term service contract that does not affect your borrowing limits or debt covenants and does not encumber your balance sheet.

# **PPA Project Development: The White Pine Advantage**

Successful development of a PPA project requires evaluating and resolving project-specific issues that may arise. White Pine's permitting, design, and financing experience combined with a strong EPC partner benefits all of our projects, as we identify and mitigate issues early in the process., and ensure a high quality, reliable system is constructed and built, and ultimately, placed into the WPR operating asset management portfolio. following summarizes the main categories and types of solutions White Pine Renewables provides:



#### **Real Estate**

White Pine's developers work with customers early to evaluate the title to all relevant parcels and to ensure that the legal terms for providing access to the site comply with other insurance and interconnection requirements. We have extensive experience working with a variety of land ownership structures, license and lease policies.

#### **Entitlements (i.e. Permitting, Easements, etc.)**

Standard building permit, environmental review, and negotiating easements may affect project design and timeline. White Pine's permit team will collect and review in detail the relevant information from title companies, recorded documents, survey, and discussions with the customer. We work with the customer to find the best project design to minimize issues and identify resolutions (such as environmental mitigations or easement waivers) early in the development of the project.

#### Construction

Cost-effective engineering, procurement and construction strategies are incorporated into our PPA offerings. White Pine optimizes system design and constructability based on our experience building hundreds of megawatts. The value of good design is passed on to customers through competitive PPA rates, and entices investors to partner on projects where development and construction are seamlessly integrated.

#### **Utility Interconnection**

Understanding the utility's process and potential costs for interconnection is critical to project development. White Pine's dedicated interconnection team evaluates project design to minimize costs, and estimate timelines as one of the factors in PPA offering. As a project progresses, we continually update timelines and financial models to account for the utility review process.

#### **Investor Relations**

White Pine is the long term owner and operator of your project. Unlike many of our competitors, we have already secured financing for your project through our existing solar investment fund. Investors appreciate White Pine Renewable's ability to maintain responsibility and accountability for the long term project performance, as it keeps us aligned with our customers in that our financial return is based on the performance of the system, and engaged and working with all stakeholders to ensure the project is a win-win-win.



#### **Financial Summary**

White Pine understands the complexity of calculating the actual value of energy produced by a PV system. The savings from investment in a PV system varies by project and is based on several factors, such as:

- The utility territory in which the project resides;
- Total energy usage on the customer meter(s);
- Utility rate schedules assigned to those meter(s), and any rate switching that may be available;
- Variations in seasonal and time-of-use period usage;
- Costs imposed by the utility at the time of interconnection;
- Financing terms;
- Changes in operating expenses over the life of the project; and
- Federal and state tax situations.

#### **Net Metering Aggregation (NEMA) Overview**

Net Metering Aggregation (NEMA) is an arrangement that allows meters that are located on 'an unbroken chain of contiguous parcels' owned by the same entity to be aggregated together and offset by a single solar PV system, also on the same or an adjacent parcel in the chain of land. Similar to NEM, credits are determined by their time-of-use (TOU) period of generation. For example, peak price periods in the late afternoon and evening are the most expensive to buy electricity but also credit the most for solar generation.

After a billing month is complete, PV generation is divided into the TOU periods when it was produced during the month and then allocated to each meter in the NEMA arrangement based on their own proportion of load (kWh usage) relative to all the other meters in the arrangement. This allocated PV generation is then credited to the overall account energy bill according to the specific rate tariff of each meter to which it was allocated (the value of the credit being determined by the specific energy charge on that specific meter's rate for the applicable TOU period).

As outlined above, the proposed NEMA PV project for NKWSD includes the 7 deep well meters surrounding the retention ponds at the project site. These 7 will be aggregated into the NEMA Arrangement as explained above and credited when the PV system generates electricity (example calculation given below).

# **NEMA Credit Analysis**

NEMA calculations are complex and meter/tariff-specific, but luckily for this analysis all 7 of NKWSD's deep well meters are on the same tariff, AG-C, so they are all credited by PV generation in the same way. See below for an explanation on how credits would be allocated and calculated from solar PV.

The first figure below shows the typical PV generation profile for NKWSD's system over a single day in July (with the x-axis being time and the y-axis kWh generation). Energy is generated beginning in the early morning hou&s and climbs until peak generation in the hours around noon before tailing off in the evening. What's



important about this inverted-U shape, however, is that the shape dictates how those kWhs will be allocated (to each meter in the NEMA Arrangement) based on the time when they were generated (TOU period). This timing then corresponds to a specific credit value based on each meter's applicable tariff (again, for this project all 7 meters are on the AG-C tariff).

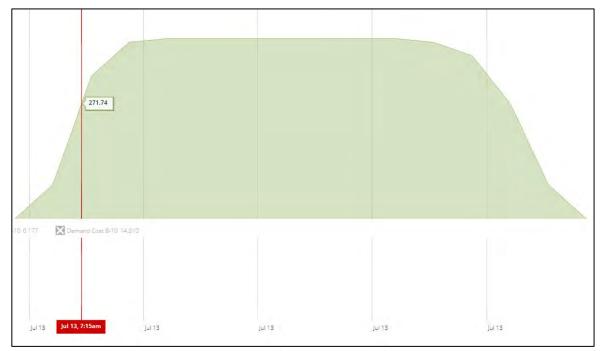


Figure 1: Daily PV generation in July

#### Meter x8739 on Tariff AG-C

For this example, we'll focus on a single meter in the NEMA Arrangement to demonstrate how it would accumulate monetary credits. Meter x8739's TOU periods and seasons are outlined below. Each season and TOU period has a different price for energy (determined by PG&E), and thus the credit given for PV generation varies with each as well. Below the season and TOU information there is a table that shows the credit values given to each kWh of PV generation depending on the time and season it was produced. We can use a similar table for each meter in the NEMA Arrangement, combined with our known output of when the PV system will generate energy throughout the year, to come up with an overall amount of credits, or the value of solar (e.g. savings) that your system will produce.

Winter Season: October through May Summer Season: June through September

Winter & Summer Peak Periods: 5:00 PM – 8:00 PM Winter & Summer Off Peak Periods: 8:00 PM – 5:00 PM

AG-C Credit Values					
Winter Summer					
On Peak	\$.0979	\$.1125			
<i>Off Peak</i> \$.0724 \$.0831					



#### Renewable Energy System Bill Credit Transfer (RES-BCT) Overview

The RES-BCT program is designed specifically to allow a Local Government/Public Agencies to install up to 5 MWac of renewable generation within its geographic boundary, offset any coincident usage at the generator site (the physical meter the PV system is connected to), and convert excess electricity exported to the utility grid to credits that can be used to offset generation component charges at other locations (benefitting accounts, up to 50 meters total) within the same geographic boundary.

Project options 2 & 3 for NKWSD utilize the RES-BCT program to determine the appropriate size of the PV system and how much savings it will provide for NKWSD. The first RES-BCT option is a single 5MWac solar PV project which produces energy to credit the 50 largest meters out of NKWSD's total 122 within the boundary. The second RES-BCT option includes 50 more of the total 122 meters and a separate 5MWac project to credit those meters in the arrangement (connected to the distribution system as a separate project but in the same location as the single 5MWac RES-BCT).

#### **Timing is Critical: RES-BCT Availability**

The primary economic driver for this project is that there is currently < 25MWac of available capacity under the PG&E RES-BCT tariff, and several other 1 - 5MW projects already under development. Once the RES-BCT cap is reached (105 MW), the program will be closed and there will be no future opportunities for a RES-BCT project. So, we are racing against the clock to ensure we can reserve program capacity.

#### **RES-BCT Generation Credits**

We collected and analyzed the last 36 months of utility bills for the 122 NKWSD PG&E meters. Under RES-BCT, we can build one 5 MWac project for up to 50 individual crediting meters.

The PG&E RES-BCT tariff allows a solar project for municipal customers to offset the generation component of a customer's energy bill (this is just a specific line item that makes up your overall electricity charge). The PV project will interconnect to a new meter installed and connected to PG&E's grid. This new meter will be assigned the B6 tariff, which has higher energy generation costs than the current meters on-site which the project could connect to (all 7 are on the AG-C tariff, as outlined above). This higher energy generation cost means more savings for your system. Similar to the explanation of NEMA credits given above, below are the seasons and TOU periods for the B6 tariff. The table below that gives the generation component of your bill during each of those periods, and is the value at which each kWh of solar energy generated will be credited to the account.

Winter Season 1: October through February Winter Season 2: March through May Summer Season: June through September Winter 1 On Peak Periods: 4 PM — 9 PM Winter 1 Off Peak Periods: 9 PM — 4 PM Winter 2 On Peak Periods: 4 PM — 9 PM

Winter 2 Off Peak Periods: 2 PM - 4 PM; 9 PM - 9 AM

Winter 2 Super Off Peak Periods: 9 AM - 2 PM

Summer On Peak Periods: 4 PM — 9 PM Summer Off Peak Periods: 9 PM — 4 PM



Customer Charges			Energy Charges				
Season	Charge Type	Rate Type	B-6 - RES-BCT	Season	Charge Type	Rate Type	B-6 - RES-BCT
W1	Flat Rate	per day	\$0.82	W1	On Peak	Import	\$0.11172
W2	Flat Rate	per day	\$0.82	W1	Off Peak	Import	\$0.09466
S	Flat Rate	per day	\$0.82	W2	On Peak	Import	\$0.11172
				W2	Off Peak	Import	\$0.09466
				W2	Super Off Peak	Import	\$0.07825
				S	On Peak	Import	\$0.17524
				S	Off Peak	Import	\$0.10408

Figure 1: Generation Component Credits for the B6 Tariff



# **Proposed System Design**

A map of the proposed array location is provided below.

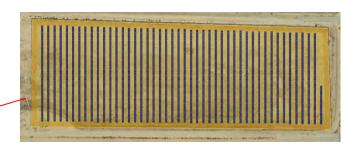
The utility does not provide reliable, current information on the distribution line or substation capacity, potential cost for distribution upgrades required to interconnect, or interconnection timelines, until a project has submitted an interconnection application.

White Pine will assume all of the responsibility for managing the PG&E interconnection application process and associated cost upgrades. NKWSD will have no out of pocket (\$0) expenses related to the project development process (permitting, PG&E interconnection, etc.). Only after power is being generated and the system is operational will NKWSD make its first payment for electricity & savings delivered.

#### **Preliminary System Design and Layout**

#### **NKWSD NEMA**





#### **NKWSD RES-BCT**





#### **NKWSD 2x RES-BCT**





# **Cash Flow Summaries for the Proposed PV Project Options**

The following pages present pro forma cash flow models for the proposed project including:

- 1. Power purchase agreement (PPA)—25-year term—NEMA PV;
- 2. Power purchase agreement (PPA)—25-year term—RES-BCT PV;
- 3. Power purchase agreement (PPA)—25-year term—2x RES-BCT PV



# North Kern Water Storage District - Net Metering Aggregation Program - Solar PV Only

# **Key Financial Metrics**

PV System Size	2,210 kW <b>PPA Rate, Yr 1</b>	\$0.0850/kWh
Est. PV Energy Production	4,590,170 kWh PPA Escalator	0.0%
Value of PV	\$0.113/kWh PPA Term	25 years
Value of ESS	\$0.000/kWh Utility Energy Esc. Rate	4.0%
Total Value of PV + ESS	\$0.113/kWh PV Degradation Rate	0.5%

## **Key Advantages of a Power Purchase Agreement**

- No up-front capital commitment
- No risk: Customer only pays for electricity actually produced
- No operation & maintenance: WPR performs panel cleaning, repairs etc.
- No insurance costs
- No price volatility: Simplified and predictable electricity budgeting
- No legacy issues: Freedom to have system removed at end of PPA term



Years	Solar PV Production	PG&E Utility Bill Savings	PPA Rate	PPA Bill	Solar PV + ESS Annual Savings	<b>Cumulative Savings</b>
Year 1	4,590,170 kWh	\$ 518,689	\$ 0.0850	\$ 390,164	\$ 128,525	\$ 128,525
Year 2	4,567,219 kWh	\$ 536,740	\$ 0.0850	\$ 388,214	\$ 148,526	\$ 277,051
Year 3	4,544,383 kWh	\$ 555,418	\$ 0.0850	\$ 386,273	\$ 169,146	\$ 446,196
Year 4	4,521,661 kWh	\$ 574,747	\$ 0.0850	\$ 384,341	\$ 190,405	\$ 636,602
Year 5	4,499,053 kWh	\$ 594,748	\$ 0.0850	\$ 382,419	\$ 212,328	\$ 848,930
Year 6	4,476,558 kWh	\$ 615,445	\$ 0.0850	\$ 380,507	\$ 234,938	\$ 1,083,868
Year 7	4,454,175 kWh	\$ 636,863	\$ 0.0850	\$ 378,605	\$ 258,258	\$ 1,342,126
Year 8	4,431,904 kWh	\$ 659,025	\$ 0.0850	\$ 376,712	\$ 282,314	\$ 1,624,439
Year 9	4,409,744 kWh	\$ 681,959	\$ 0.0850	\$ 374,828	\$ 307,131	\$ 1,931,570
Year 10	4,387,696 kWh	\$ 705,692	\$ 0.0850	\$ 372,954	\$ 332,738	\$ 2,264,308
Year 11	4,365,757 kWh	\$ 730,250	\$ 0.0850	\$ 371,089	\$ 359,160	\$ 2,623,468
Year 12	4,343,928 kWh	\$ 755,662	\$ 0.0850	\$ 369,234	\$ 386,429	\$ 3,009,897
Year 13	4,322,209 kWh	\$ 781,959	\$ 0.0850	\$ 367,388	\$ 414,572	\$ 3,424,469
Year 14	4,300,598 kWh	\$ 809,172	\$ 0.0850	\$ 365,551	\$ 443,621	
Year 15	4,279,095 kWh	\$ 837,331	\$ 0.0850	\$ 363,723	\$ 473,608	\$ 4,341,697
Year 16	4,257,699 kWh	\$ 866,470	\$ 0.0850	\$ 361,904	\$ 504,566	\$ 4,846,263
Year 17	4,236,411 kWh	\$ 896,623	\$ 0.0850	\$ 360,095	\$ 536,528	\$ 5,382,791
Year 18	4,215,229 kWh	\$ 927,826	\$ 0.0850	\$ 358,294	\$ 569,531	\$ 5,952,322
Year 19	4,194,153 kWh	\$ 960,114	\$ 0.0850	\$ 356,503	\$ 603,611	\$ 6,555,933
Year 20	4,173,182 kWh	\$ 993,526	\$ 0.0850	\$ 354,720	\$ 638,805	\$ 7,194,739
Year 21	4,152,316 kWh	\$ 1,028,101	\$ 0.0850	\$ 352,947	\$ 675,154	\$ 7,869,892
Year 22	4,131,554 kWh	\$ 1,063,879	\$ 0.0850	\$ 351,182	\$ 712,696	\$ 8,582,589
Year 23	4,110,897 kWh		\$ 0.0850			
Year 24	4,090,342 kWh	\$ 1,139,213	\$ 0.0850	\$ 347,679	\$ 791,534	
Year 25	4,069,890 kWh		\$ 0.0850	\$ 345,941	\$ 832,917	
Total	108,125,821 kWh			\$ 9,190,695	\$ 10,958,515	



# North Kern Water Storage District - RES-BCT - Solar PV Only

# **Key Financial Metrics**

PV System Size	7,000 kW <b>PPA Rate, Yr 1</b>	\$0.0760/kWh
Est. PV Energy Production	14,623,000 kWh PPA Escalator	0.0%
Value of PV	\$0.105/kWh PPA Term	25 years
Value of ESS	\$0.000/kWh Utility Energy Esc. Rate	4.0%
Total Value of PV + ESS	\$0.105/kWh PV Degradation Rate	0.5%

# **Key Advantages of a Power Purchase Agreement**

- No up-front capital commitment
- No risk: Customer only pays for electricity actually produced
- No operation & maintenance: WPR performs panel cleaning, repairs etc.
- No insurance costs
- No price volatility: Simplified and predictable electricity budgeting
- No legacy issues: Freedom to have system removed at end of PPA term



Years	Solar PV Production	PG&E Utility Bill Savings	PPA Rate	PPA Bill	Solar PV + ESS Annual Savings	<b>Cumulative Savings</b>
Year 1	14,623,000 kWh	\$ 1,535,415	\$ 0.0760	\$ 1,111,348	\$ 424,067	\$ 424,067
Year 2	14,549,885 kWh	\$ 1,588,847	\$ 0.0760	\$ 1,105,791	\$ 483,056	\$ 907,123
Year 3	14,477,136 kWh	\$ 1,644,139	\$ 0.0760	\$ 1,100,262	\$ 543,877	\$ 1,451,000
Year 4	14,404,750 kWh	\$ 1,701,355	\$ 0.0760	\$ 1,094,761	\$ 606,594	\$ 2,057,595
Year 5	14,332,726 kWh	\$ 1,760,563	\$ 0.0760	\$ 1,089,287	\$ 671,275	\$ 2,728,870
Year 6	14,261,063 kWh	\$ 1,821,830	\$ 0.0760	\$ 1,083,841	\$ 737,989	\$ 3,466,859
Year 7	14,189,757 kWh	\$ 1,885,230	\$ 0.0760	\$ 1,078,422	\$ 806,808	\$ 4,273,668
Year 8	14,118,808 kWh	\$ 1,950,836	\$ 0.0760	\$ 1,073,029	\$ 877,806	\$ 5,151,474
Year 9	14,048,214 kWh	\$ 2,018,725	\$ 0.0760	\$ 1,067,664	\$ 951,061	\$ 6,102,535
Year 10	13,977,973 kWh	\$ 2,088,977	\$ 0.0760	\$ 1,062,326	\$ 1,026,651	\$ 7,129,185
Year 11	13,908,083 kWh	\$ 2,161,673	\$ 0.0760	\$ 1,057,014	\$ 1,104,659	\$ 8,233,844
Year 12	13,838,543 kWh	\$ 2,236,899	\$ 0.0760	\$ 1,051,729	\$ 1,185,170	\$ 9,419,014
Year 13	13,769,350 kWh	\$ 2,314,743	\$ 0.0760	\$ 1,046,471	\$ 1,268,273	\$ 10,687,286
Year 14	13,700,504 kWh	\$ 2,395,296	\$ 0.0760	\$ 1,041,238	\$ 1,354,058	\$ 12,041,344
Year 15	13,632,001 kWh	\$ 2,478,653	\$ 0.0760	\$ 1,036,032	\$ 1,442,621	\$ 13,483,965
Year 16	13,563,841 kWh	\$ 2,564,910	\$ 0.0760	\$ 1,030,852	\$ 1,534,058	\$ 15,018,022
Year 17	13,496,022 kWh		\$ 0.0760	\$ 1,025,698	\$ 1,628,471	\$ 16,646,493
Year 18	13,428,542 kWh	\$ 2,746,534	\$ 0.0760	\$ 1,020,569	\$ 1,725,964	\$ 18,372,458
Year 19	13,361,399 kWh	\$ 2,842,113	\$ 0.0760	\$ 1,015,466	\$ 1,826,647	\$ 20,199,104
Year 20	13,294,592 kWh	\$ 2,941,019	\$ 0.0760	\$ 1,010,389	\$ 1,930,630	\$ 22,129,734
Year 21	13,228,119 kWh	\$ 3,043,366	\$ 0.0760	\$ 1,005,337	\$ 2,038,029	\$ 24,167,763
Year 22	13,161,978 kWh	\$ 3,149,275	\$ 0.0760	\$ 1,000,310	\$ 2,148,965	\$ 26,316,728
Year 23	13,096,169 kWh		\$ 0.0760		\$ 2,263,561	
Year 24	13,030,688 kWh			\$ 990,332	\$ 2,381,946	
Year 25	12,965,534 kWh				\$ 2,504,253	
Total	344,458,677 kWh			\$ 26,178,859	\$ 33,466,488	



# North Kern Water Storage District - 2x RES-BCT - Solar PV Only

# **Key Financial Metrics**

PV System Size	14,000 kW PPA Rate, Yr 1	\$0.0760/kWh
Est. PV Energy Production	29,190,000 kWh PPA Escalator	0.0%
Value of PV	\$0.105/kWh PPA Term	25 years
Value of ESS	\$0.000/kWh Utility Energy Esc. Rate	4.0%
Total Value of PV + ESS	\$0.105/kWh PV Degradation Rate	0.5%

# **Key Advantages of a Power Purchase Agreement**

- No up-front capital commitment
- No risk: Customer only pays for electricity actually produced
- No operation & maintenance: WPR performs panel cleaning, repairs etc.
- No insurance costs
- No price volatility: Simplified and predictable electricity budgeting
- No legacy issues: Freedom to have system removed at end of PPA term



Years	Solar PV Production	PG&E Utility Bill Savings	PPA Rate	PPA Bill	Solar PV + ESS Annual Savings	<b>Cumulative Savings</b>
Year 1	29,190,000 kWh	\$ 3,064,950	\$ 0.0760	\$ 2,218,440	\$ 846,510	\$ 846,510
Year 2	29,044,050 kWh	\$ 3,171,610	\$ 0.0760	\$ 2,207,348	\$ 964,262	\$ 1,810,772
Year 3	28,898,830 kWh	\$ 3,281,982	\$ 0.0760	\$ 2,196,311	\$ 1,085,671	\$ 2,896,444
Year 4	28,754,336 kWh	\$ 3,396,195	\$ 0.0760	\$ 2,185,330	\$ 1,210,866	\$ 4,107,309
Year 5	28,610,564 kWh	\$ 3,514,383	\$ 0.0760	\$ 2,174,403	\$ 1,339,980	\$ 5,447,289
Year 6	28,467,511 kWh	\$ 3,636,683	\$ 0.0760	\$ 2,163,531	\$ 1,473,153	\$ 6,920,442
Year 7	28,325,174 kWh	\$ 3,763,240	\$ 0.0760	\$ 2,152,713	\$ 1,610,527	\$ 8,530,969
Year 8	28,183,548 kWh	\$ 3,894,201	\$ 0.0760	\$ 2,141,950	\$ 1,752,251	\$ 10,283,220
Year 9	28,042,630 kWh	\$ 4,029,719	\$ 0.0760	\$ 2,131,240	\$ 1,898,479	\$ 12,181,699
Year 10	27,902,417 kWh	\$ 4,169,953	\$ 0.0760	\$ 2,120,584	\$ 2,049,369	\$ 14,231,068
Year 11	27,762,905 kWh	\$ 4,315,068	\$ 0.0760	\$ 2,109,981	\$ 2,205,087	\$ 16,436,155
Year 12	27,624,090 kWh	\$ 4,465,232	\$ 0.0760	\$ 2,099,431	\$ 2,365,801	\$ 18,801,956
Year 13	27,485,970 kWh	\$ 4,620,622	\$ 0.0760	\$ 2,088,934	\$ 2,531,688	\$ 21,333,644
Year 14	27,348,540 kWh	\$ 4,781,420	\$ 0.0760	\$ 2,078,489	\$ 2,702,931	\$ 24,036,575
Year 15	27,211,797 kWh	\$ 4,947,813	\$ 0.0760	\$ 2,068,097	\$ 2,879,716	\$ 26,916,291
Year 16	27,075,738 kWh	\$ 5,119,997	\$ 0.0760	\$ 2,057,756	\$ 3,062,241	\$ 29,978,532
Year 17	26,940,360 kWh	\$ 5,298,173	\$ 0.0760	\$ 2,047,467	\$ 3,250,705	\$ 33,229,238
Year 18	26,805,658 kWh	\$ 5,482,549	\$ 0.0760	\$ 2,037,230	\$ 3,445,319	\$ 36,674,557
Year 19	26,671,629 kWh	\$ 5,673,342	\$ 0.0760	\$ 2,027,044	\$ 3,646,298	\$ 40,320,855
Year 20	26,538,271 kWh	\$ 5,870,774	\$ 0.0760	\$ 2,016,909	\$ 3,853,866	\$ 44,174,720
Year 21	26,405,580 kWh	\$ 6,075,077	\$ 0.0760	\$ 2,006,824	\$ 4,068,253	\$ 48,242,973
Year 22	26,273,552 kWh	\$ 6,286,490	\$ 0.0760	\$ 1,996,790	\$ 4,289,700	\$ 52,532,673
Year 23	26,142,184 kWh	\$ 6,505,260	\$ 0.0760	\$ 1,986,806	\$ 4,518,454	\$ 57,051,127
Year 24	26,011,473 kWh	\$ 6,731,643	\$ 0.0760	\$ 1,976,872	\$ 4,754,771	\$ 61,805,898
Year 25	25,881,416 kWh	\$ 6,965,904	\$ 0.0760	\$ 1,966,988	\$ 4,998,916	\$ 66,804,814
Total	687,598,222 kWh			\$ 52,257,465	\$ 66,804,814	



# **White Pine Renewables Experience**

White Pine Renewables is a trusted developer, owner, operator of solar projects to agricultural clients, irrigation districts, schools, municipalities and cities in California and the Midwest. Our Principals have over 35 years of experience in the solar industry, developing, constructing and operating over 3,000 MW of solar. We currently own and operate over 20 solar projects for our customers, and are developing and constructing across California and the United States. A small sampling of our projects and client base are below:

White Pine Customer	System Size	State
Olam Farming	16 MWdc Portfolio	CA
Corcoran Irrigation District	6 MWdc Portfolio	CA
TeaPot Dome Water District	500 kWdc	CA
City of Healdsburg WWTP	5 MWdc	CA
City of Eloy	100 kWdc	AZ
Northern Indiana Public Service Company	3 MWdc Portfolio	IN
Addison and Madison Schools Districts	550 kWdc Portfolio	MI
LaGrange School District 102	850kWdc Portfolio	IL

# **Customers and Partners**



#### WHITE PINE TEAM PROJECT TEAM EXPERIENCE

Over 200 Megawatts Installed

#### **AGRIBUSINESS**





















COMMERCIAL





















GOVERNMENT















# **Evan Riley - CEO**

Evan leads development, engineering, and EPC for White Pine Renewables.

- Former Vice President of Development at Cypress Creek Renewables.
- Built and led the team responsible for over 2 GW of capacity from concept to completion across 150 projects nationwide.
- Former Engineering Manager at Black and Veatch where he supported over \$10bn of project-level transactions in solar and \$1bn of venture capital and government investments into solar tech companies.
- MS in Solar Engineering from Dalarna University, European Solar Engineering School. BS in Physics and Math from Indiana University.



#### **Dylan Dupre - President**

Dylan leads sales, marketing, and customer service for White Pine Renewables.

- Formerly, as the President & CEO of CalCom Energy Dylan built CalCom into one of the fastest growing companies in the U.S. for three consecutive years, named by Inc. 500. In 24 months, they scaled from \$3M in sales to over \$60M.
- He has over 16 years of solar PV experience and has originated, developed, and financed over 200 MW of behind the meter projects across the United States.
- Dylan holds a BA from the University of California, Berkeley.



#### Michael Kremer – Head of Structured Finance

Michael leads corporate and project finance at White Pine, raising capital for the full project lifecycle spanning development, tax equity, debt, and M&A.

- Former Director of the Project Finance team at Cypress Creek Renewables.
- Created \$1+ billion of capital raises across the corporate and project finance spectrum and led other key strategic initiatives on the development and operations sides of the business.
- Michael has a BA in International Relations from Tufts University.

This Solar Services Agreement (as it may be amend	ed from time to time, this "Agreement")
is made and entered into as of the day of	, 2021 (the "Execution Date",
between [White Pine Project Company], a Delaware	limited liability company ("Power
Provider"), and North Kern Water Storage District, a [	] ("Purchaser").

#### **RECITALS**

WHEREAS, Purchaser leases or owns, directly or indirectly, facilities in that certain location in California as more fully described in <u>Schedule 8</u> hereto (the "<u>Site</u>"); and

WHEREAS, Power Provider is installing, and will be maintaining and operating, at its sole cost and expense the Solar Power Facility (as hereinafter defined) on the Site for the purpose of generating and providing Electric Power (as hereinafter defined); and

WHEREAS, Power Provider desires to sell Electric Power, and Purchaser desires to purchase Electric Power that Power Provider delivers to the Purchaser in exchange for Purchaser's receipt of corresponding bill credits from Pacific Gas & Electric Company under the Tariff (as hereinafter defined), pursuant to the terms and conditions set forth herein.

NOW THEREFORE, in consideration of the mutual promises set forth below, and other good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, the Parties hereby agree as follows:

#### **AGREEMENT**

#### 1. Definitions.

For the purposes of this Agreement, the following terms shall have the following meanings:

- "<u>Acknowledgement Date</u>" means, with respect to the Solar Power Facility, the "Acknowledgement Date" set forth on the Certificate of Acknowledgement relating to the Solar Power Facility that has been executed and delivered by Purchaser to Power Provider.
- "<u>Affiliate</u>" means, when used in reference to a specified Person, any Person that directly or indirectly, through one or more intermediaries, controls, is controlled by, or is under common control with the specified Person.
- "Benefiting Account" shall have the meaning ascribed to it under the Tariff.
- "Bill Credit" means an amount of money credited to a Benefiting Account that is calculated based upon the time-of-use electricity generation component of the electricity usage charge of the generating account of Purchaser, multiplied by the quantities of electricity generated by the Solar Power Facility that are exported to the grid during the corresponding time period. Electricity is exported to the grid if it is generated by an eligible renewable generating facility, is not utilized onsite by the local government, and the electricity flows through the meter site and on to the Utility's distribution or transmission infrastructure.

"Business Day" means any day other than Saturday, Sunday or any other day on which banking institutions in New York, NY are legally required or authorized to be closed for business.

"Certificate of Acknowledgement" means, with respect to the Solar Power Facility, the certificate of an authorized representative of Purchaser, in the form attached hereto as Schedule 4, delivered upon notification by Power Provider that the Solar Power Facility is in Commercial Operation, acknowledging that the Solar Power Facility is in Commercial Operation.

"Code" means the Internal Revenue Code of 1986, as amended.

"Commercial Operation" means, with respect to the Solar Power Facility, the condition existing (as determined by Power Provider) when (i) the Solar Power Facility is mechanically complete and operating and (ii) energy is delivered through the Solar Power Facility's meter to the Point of Delivery under an Interconnection Agreement with the Utility, as those terms are defined herein.

"Commercial Operation Date" means the date the Solar Power Facility has achieved Commercial Operation as certified in writing by Power Provider to Purchaser.

"Contract Term" means the period commencing on the Execution Date and continuing so long as the Contract Term is in effect, including the Initial Term and all Renewal Terms.

"<u>Electric Power</u>" means the total quantity of electricity generated by the Solar Power Facility and delivered to the Point of Delivery. Electric Power does not include Environmental Attributes and/or Environmental Incentives.

"Environmental Attributes" means the characteristics of electric power generation at the Solar Power Facility that have intrinsic value, separate and apart from the Electric Power, such as tradable Solar Renewable Energy Certificates or Credits as applicable (SRECs), green-e tags, allowances, reductions or other transferable indicia denoting carbon offset credits or indicating generation of a particular quantity of energy from a renewable energy source by a renewable energy facility attributed to the Solar Power Facility or Electric Power during the Contract Term created under a renewable energy, emission reduction, or other reporting program adopted by a Governmental Authority, or for which a registry and a market exists (which, as of the Execution Date are certificates issued by Green-e in accordance with the Green-e Renewable Electric Certification Program, National Standard Version 1.3 administered by the Center of Resource Solutions) or for which a market may exist at a future time, including but not limited to all environmental and other attributes that differentiate the Solar Power Facility or the Electric Power from energy generated by fossil-fuel based generation units, fuels or resources, characteristics of the Solar Power Facility that may result in the avoidance of environmental impacts on air, soil or water, such as the absence of emission of any oxides of nitrogen, sulfur or carbon or of mercury, or other gas or chemical, soot, particulate matter or other substances attributable to the Solar Power Facility or the compliance of the Solar Power Facility or the Electric Power with the law, rules and standards of the United Nations Framework Convention on Climate Change (the "UNFCCC") or the Kyoto Protocol to the UNFCCC or crediting "early action" with a view thereto, or laws or regulations involving or administered by the Clean Air Markets Division of the Environmental Protection Agency or successor administrator or any state or federal entity given jurisdiction over

a program involving transferability of rights arising from Environmental Attributes and Reporting Rights.

"Environmental Incentives" means all rights, credits (including tax credits and other tax benefits), rebates, incentives, benefits, reductions, offsets, and allowances and entitlements of any kind, howsoever entitled or named (including carbon credits and allowances and emission reduction credits and offsets), whether arising under federal, state or local law, international treaty, trade association membership or the like, the Solar Power Facility or the Electric Power or otherwise from the development or installation of the Solar Power Facility or the production, sale, purchase, consumption or use of the Electric Power that are in effect as of the Execution Date or may come into effect in the future. Without limiting the foregoing, "Environmental Incentives" includes, the right to apply for (and entitlement to receive) incentives under any demand-side management or energy efficiency programs offered by a utility company, a third-party power provider or any incentive programs offered by the Jurisdiction and excluding the right to claim income tax credits and other tax benefits under Sections 45 or 48 (or cash grants in lieu thereof) of the Code or any state tax law or income tax deductions under the Code or any state tax law.

"Environmental Law" means any and all federal, state, local, provincial and foreign, civil and criminal laws, statutes, ordinances, orders, common law, codes, rules, regulations, judgments, decrees, injunctions relating to the protection of health and the environment, worker health and safety, and/or governing the handling, use, generation, treatment, storage, transportation, disposal, manufacture, distribution, formulation, packaging, labeling, or release to the environment of or exposure to Hazardous Materials, including any such requirements implemented through Governmental Approvals.

"Event of Default" has the meaning set forth in Section 16.

"Execution Date" has the meaning set forth on the first page of this Agreement.

"Fair Market Value" means, with respect to any tangible asset or service, the price that would be negotiated in an arm's-length, free market transaction, for cash, between an informed, willing seller and an informed, willing buyer, neither of whom is under compulsion to complete the transaction. Fair Market Value of the Solar Power Facility will be determined pursuant to Section 8(c).

"Force Majeure" means events or circumstances, whether foreseen or unforeseen, beyond the reasonable control and not the fault of a Nonperforming Party, including, without limitation, (i) acts of God, (ii) sabotage, riots or civil disturbances, strikes or similar labor difficulties, (iii) pandemic, epidemic, volcanic eruptions, earthquake, hurricane, flood, ice storms, explosion, fire, lightning, landslide or similar occurrence, (iv) war or acts of terrorism affecting the Site, (v) change of law imposing prohibition upon Power Provider or Purchaser, (vi) withdrawal of required governmental authorizations or permits not due to the fault of Power Provider or Purchaser, (vii) acts of vandalism, (viii) requirements by the Utility or Governmental Authority that the Solar Power Facility discontinue operation for reasons beyond the control of the Power Provider or Purchaser; (ix) appropriation or diversion of electricity by sale or order of any governmental authority having jurisdiction thereof, (x) any other action by any Governmental

Authority or the Utility which prevents or prohibits the Parties from carrying out their respective obligations under this Agreement. Notwithstanding the foregoing, "Force Majeure" shall not include economic hardship or inability to obtain financing of either Party.

"Generating Account" shall have the meaning ascribed to it under the Tariff.

"Governmental Approval" means any approval, consent, franchise, permit, certificate, resolution, concession, license, or authorization issued by or on behalf of any applicable Governmental Authority, including any such approval, consent, order or binding agreements with or involving a governmental authority under Environmental Law.

"Governmental Authority" shall mean any domestic federal, state, regional, county, town, city, district or municipal government other than Purchaser, or any department, agency, bureau, or other administrative, regulatory or judicial body of any such government.

"Hazardous Materials" means any hazardous or toxic material, substance or waste, including petroleum, petroleum hydrocarbons or petroleum products, petroleum by-products, radioactive materials, asbestos or asbestos-containing materials, gasoline, diesel fuel, pesticides, radon, urea formaldehyde, mold, lead or lead-containing materials, polychlorinated biphenyls; and any other chemicals, materials, substances or wastes in any amount or concentration which are regulated under or for which liability can be imposed under any Environmental Law.

"Initial Term" means twenty-five (25) years from the Commercial Operation Date.

"Interconnection Agreement" means the form "Generating Facility Interconnection Agreement for Local Government Renewable Energy Self-Generation Bill Credit Transfer (RES-BCT)", to be entered into between Power Provider and the Utility that provides for the Solar Power Facility to be interconnected with the Utility's electrical distribution system at the Point of Delivery, and which is attached hereto as Schedule 7.

"Interest Rate" shall mean the greater of: (i) one percent (1%) per month or (ii) a variable rate of interest which is 100 basis points greater than the three (3) month London Interbank Offered Rate as posted with respect to the applicable period in the "Money Rates" column of The Wall Street Journal (or another widely available business publication if that publication is not available), or if the London Interbank Offered Rate is not available, the parties agree to use the Secured Overnight Financing Rate as the replacement (as reported by a widely available business publication) or if the Secured Overnight Financing Rate is not being widely used in the financial industry as the replacement for the London Interbank Offered Rate, the replacement rate that is widely accepted in the financial industry (as reported by a widely available business publication), but in any event not greater than the maximum interest rate permitted by law.

"ITC" means the solar investment tax credits provided for pursuant to Section 48 of the Internal Revenue Code of 1986, as amended from time to time, and any corresponding provisions of any successor tax statute.

"Jurisdiction" means the State of California.

- "Lender" means any financial institution or other Person that from time to time provides secured financing for some or all of the Solar Power Facility, and any agent, security agent, collateral agent, indenture trustee, loan trustee, loan participant or participating or syndicated lenders involved in whole or in part in such financing, and their respective representative, successors and permitted assigns.
- "<u>License</u>" or "<u>License Agreement</u>" means the recognition of the rights of Power Provider to the use of, access to, and ingress to and egress from the Site, including in particular those referenced in Section 10(j) and 13(a) herein, as may be memorialized by the recordation of the Memorandum of License attached hereto as Exhibit A and incorporated herein.
- "Nonperforming Party" means a Party that is prevented, in whole or in part, from performing its obligations under this Agreement.
- "Parties" means Power Provider and Purchaser and their permitted assignees.
- "Party" means Power Provider or Purchaser or a permitted assignee of Power Provider or Purchaser.
- "<u>Performance Guaranty</u>" means the performance guaranty set forth on Schedule 3 pursuant to which Power Provider guarantees to provide Purchaser with a certain amount of Electric Power for each Contract Year.
- "Person" means any individual, corporation, partnership, joint venture, association, joint stock company, trust, trustee, estate, limited liability company, unincorporated organization, real estate investment trust, government or any agency or political subdivision thereof, or any other form of entity.
- "Point of Delivery" means, with respect to the Property, the point at which the Electric Power is delivered to the Utility.
- "<u>Power Provider</u>" shall have the meaning set forth in the preamble. For purposes of access rights and other rights necessary for Power Provider to perform its obligations and responsibilities under this Agreement, the term "Power Provider" shall include Power Provider's authorized agents, contractors and subcontractors and permitted assigns.
- "Pre-Existing Environmental Conditions" means any: (i) violation of, breach of or non-compliance with any Environmental Laws with respect to the Property that first existed, arose or occurred on or prior to Provider's commencement of construction at the Property and (ii) the presence or release of, or exposure to, any Hazardous Materials at, to, on, in, under or from the Property that first existed, arose or occurred on or prior to Provider's commencement of construction at the Property.
- "Property" means that certain real property, on which the Solar Power Facility and Point of Delivery shall be located.

"Prudent Industry Practices" means those practices, methods and equipment, as changed from time to time, that are commonly used in the Jurisdiction in prudent electrical engineering and operations to install and operate solar generation equipment lawfully and with safety, reliability, efficiency and expedition.

"<u>Purchaser</u>" shall have the meaning set forth in the preamble.

"Qualified Assignee" shall mean a Person that (1) has, either directly or through an Affiliate, owned or managed solar energy systems substantially similar to the Generating Facility for at least three (3) years prior to the date of the assignment and (2) either: (x) is, or is an Affiliate of, a Person with a minimum net worth of \$50 million, (y) is a financial sponsor, private equity fund or other similar investor that owns and manages assets valued in excess of \$100 million, or (z) is the majority owner (or Affiliate of a majority owner) of one or more renewable electric generating facilities in operation that in the aggregate have a nameplate capacity of 100 megawatts or more.

"Renewal Term" shall have the meaning set forth in Section 8.

"Reporting Rights" means the right of Power Provider and or Purchaser as appropriate, to report to any federal, state or local agency, authority or other party, including without limitation under Section 1605(b) of the Energy Policy Act of 1992 and provisions of the Energy Policy Act of 2005, or under any present or future domestic, international or foreign emissions trading program, that Power Provider owns the Environmental Attributes and the Environmental Incentives associated with the Electric Power.

"Schedule" means the Schedules and all Exhibits thereto executed and attached to this Agreement by the Parties from time to time.

"Site" shall have the meaning set forth in the preamble.

"Solar Power Facility" means the electricity grid-connected photovoltaic, solar power plant and other equipment and facilities to be constructed, installed and maintained by Power Provider pursuant to this Agreement, and those as may be required pursuant to Prudent Industry Practices or applicable utility tariffs for operation of the Solar Power Facility in parallel with the Utility, for the purposes of generating, transmitting and delivering Electric Power to the Point of Delivery, and any and all additions, replacements and modifications to such equipment and facilities.

"Tariff" means Pacific Gas & Electric Company's Electric Rate Schedule RES-BCT.

"Transfer Taxes" has the meaning set forth in Section 5(b) herein.

"<u>Utility</u>" means, the electric distribution company responsible for electric energy transmission and distribution service from the Point of Delivery to the Site.

#### 2. Configuration and Installation of the Solar Power Facility.

- (a) Power Provider shall, subject to and in accordance with the provisions of this Agreement, at Power Provider's sole cost and expense, configure, construct, install and operate the Solar Power Facility.
- (b) No later than 60 days following the Execution Date, Purchaser shall work in good faith with Power Provider, at Power Provider's sole cost and expense, to a establish a Generating Account at the Point of Delivery.
- (c) Subsequent to the Execution Date and prior to the Commercial Operation Date, Purchaser and Power Provider shall work in good faith to identify and provide notice to the Utility of all 'benefiting accounts' as defined and required under the Tariff.

### 3. Power Provider's Obligations including Operation of the Solar Power Facility.

- (a) Power Provider shall be solely responsible at its sole cost and expense for the operation and maintenance of the Solar Power Facility and shall maintain the Solar Power Facility in accordance with Prudent Industry Practices during the Contract Term. Neither Purchaser nor any party related thereto shall have the right or duty or be deemed to operate the Solar Power Facility for purposes of Section 7701(e)(4)(A)(i) of the Code. Power Provider shall bear the risk of any loss with respect to the Solar Power Facility, except for losses arising from the active negligence or intentional misconduct of Purchaser, its agents, representatives, vendors or employees. Power Provider shall have full responsibility at its sole cost and expense for the Solar Power Facility operation and maintenance in compliance with all laws, regulations and government permits and approvals including, but not limited to environmental review.
- (b) Purchaser shall be responsible for arranging delivery of Electric Power from each Point of Delivery to Purchaser and any installation and operation of equipment on Purchaser's side of each Point of Delivery necessary for acceptance and use of the Electric Power. This includes but is not limited to determining and administrating benefiting accounts with the Utility to ensure the energy delivered by Power Provider is used to offset Purchaser's energy bills. Each Party may, at its own cost and expense, install and maintain on its side of each Point of Delivery, such voltage control, regulation and safety devices and equipment that it determines are necessary or appropriate to protect its own equipment and operations. Each Party shall, at its own cost and expense, operate and maintain in good working order such devices and equipment that it owns. During the applicable Contract Term, Purchaser shall not take action to permit the Site or other property that it owns to be modified in any manner if such modifications would materially adversely affect the operation and maintenance of any Solar Power Facility located at the Site or the potential of the Solar Power Facility to produce and deliver Electric Power to Purchaser.
- (c) In addition to and without limiting the other obligations of Power Provider under this Agreement and notwithstanding anything in this Agreement to the contrary, Power Provider at its sole cost and expense shall at all times while this Agreement is in effect:

- i. Cause the Solar Power Facility and any interconnection or other facilities of the Utility (as required by the Utility pursuant to the Interconnection Agreement, Tariff or otherwise) to be designed, engineered, constructed and commissioned, in accordance with the specifications in this Agreement and the Interconnection Agreement and all applicable laws and regulations including the Tariff;
- ii. Operate and maintain and as necessary construct, replace, upgrade, enhance or improve the Solar Power Facility, and interconnection facilities or other facilities of the Utility (if required by the Utility pursuant to the Interconnection Agreement, Tariff or otherwise) at Power Provider's expense; provided, that, maintenance costs incurred due to Purchaser's active negligence or material breach will be reimbursed by Purchaser;
- iii. Install and maintain and no less than annually test and as necessary calibrate for accuracy a revenue grade kilowatt-hour (kWh) meter for the measurement of electrical energy provided by the Solar Power Facility;
- iv. Notify Purchaser of any damage to the Solar Power Facility or condition related to the Solar Power Facility that poses a significant risk to health, the environment, the Solar Power Facility or the Site;
- v. Take actions reasonably necessary to ensure the Solar Power Facility is at all times capable of providing Electric Power that meets or exceeds the Performance Guaranty;
- vi. Pay the Purchaser for Power Provider's failure to achieve the Performance Guaranty;
- vii. Obtain and maintain all permits and approvals of a Governmental Authority needed to enable Power Provider to perform its obligations under this Agreement, including but not limited to any necessary environmental review and permits and approvals needed from Fresno County, with Purchaser having no responsibility for obtaining, issuing or maintaining any permits or approvals;
- viii. Take reasonable and customary safety precautions in regard to the Electric Power provided by Power Provider;
- ix. Keep the Site and Property free of liens (other than the liens on the Solar Power Facility granted to Power Provider's financing provider(s) or as incurred in the ordinary course);
- x. Pay for and reimburse Purchaser, as applicable, for all costs and expenses associated with environmental review and obtaining permits and approvals relating to this Agreement including depositing with Purchaser the estimated costs as determined by Purchaser of any environmental review Purchaser is requested to undertake as a lead or responsible agency; and

- xi. Take all actions useful or necessary for Power Provider to meet its obligations under this Agreement including actions needed to ensure the Purchaser receives Bill Credits from PG&E.
- (d) Purchaser shall have the right to invoice and Power Provider shall reimburse the Purchaser for any and all costs or expenses incurred by Purchaser for costs or expenses that are the sole responsibility of Power Provider or which the Purchaser is entitled to reimbursement from Power Provider under this Agreement, including, but not limited to, the costs referred to in Section 3(c) and any and all costs or expenses incurred by the Purchaser to assist Power Provider in obtaining environmental review and any permits or approvals from a Governmental Authority relating to this Agreement. Power Provider shall pay the Purchaser's invoices for such costs and expenses within forty-five (45) days and otherwise in accordance with the Billing and Payment provisions of Section 11(b), 11(c) and 11(d), below.

#### 4. Purchase and Sale of Electric Power and Related Services.

- (a) Beginning on the Acknowledgement Date for the Solar Power Facility, and continuing for the Contract Term, Power Provider shall deliver and sell, and Purchaser shall accept delivery and purchase, of all the Electric Power generated by the Solar Power Facility at the purchase price specified in Section 5(a). Other than Electric Power, Power Provider is not selling, and Purchaser is not purchasing, and Purchaser shall have no obligation to purchase, any electric generation-related products, services or attributes, whether physical, contractual, tangible or intangible (including reactive power, Environmental Incentives, and Environmental Attributes) under this Agreement.
- (b) Title to Electric Power sold under this Agreement shall pass from Power Provider to Purchaser at the Point of Delivery.
- (c) To the fullest extent permitted by applicable law and regulations, Purchaser may, but shall not be required to, directly or indirectly sell, resell or distribute to Purchaser's landowners and water users or others, the Electric Power.
- (d) Purchaser acknowledges that Power Provider's deliveries of Electric Power under this Agreement may not satisfy Purchaser's entire requirements for electric energy.

#### 5. Rates and Charges.

(a) Subject to Sections 7(c) and 8, Purchaser shall pay Power Provider for Electric Power delivered to Purchaser pursuant to this Agreement in accordance with the rates and charges set forth in the Schedule 1, provided, however, in no event shall Purchaser be required to pay for Electric Power for which it does not receive a corresponding Bill Credit from the Utility to the extent such lack of Bill Credit is due to the Utility's termination of the Interconnection Agreement, termination or change in the Tariff, or directly caused by Power Provider's act or omission including, but not limited to, an act or omission that results in termination of the Interconnection Agreement, and if the Solar Power Facility's design output or actual output is smaller than the amount of Electric Power required under the Performance Guaranty set forth on Schedule 5, then Power Provider shall pay to Purchaser the amount as calculated pursuant to the Performance

Guaranty. If requested by Purchaser, Power Provider, at its own cost and expense, shall use its best efforts to assist Purchaser in resolving with the Utility any inconsistencies between the Electric Power purchased from Power Provider and the Bill Credits received from such Utility to the extent such inconsistencies are directly caused by Power Provider. Notwithstanding anything in this Agreement to the contrary, Purchaser shall be entitled to terminate this Agreement if the Tariff is terminated or the Interconnection Agreement is terminated by the Utility for any reason beyond the control of Purchaser (including without limitation due to change in applicable rule, tariff, law, statute, or regulation), and, if Purchaser elects to terminate this Agreement due to such occurrence, this Agreement shall terminate without Purchaser being in default and Purchaser shall have no liability to Power Provider for any termination fee or otherwise. Subject to Purchaser's rights of termination expressly provided for in the Agreement, to the extent that some event beyond the control of Power Provider and Purchaser occurs that causes Purchaser not to receive Bill Credits, the Parties agree to work together in good faith to resolve such issue to enable Purchaser to resume receiving Bill Credits.

- (b) Power Provider shall invoice Purchaser for, and Purchaser shall pay all sales, use, excise, ad valorem, transfer and other similar taxes ("Transfer Taxes"), not currently in effect but which are newly enacted in the future and are a tax solely and directly attributable to Purchaser's purchase of Electric Power from Power Provider pursuant to this Agreement applicable under California and federal laws, but excluding in all events including, but not limited to, taxes based on or measured by net income, that are imposed by any taxing authority arising out of or with respect to the purchase or sale of the Electric Power (regardless of whether such Transfer Taxes are imposed on Power Provider or Purchaser), together with any interest, penalties or additions to tax payable with respect to such Transfer Taxes, unless such interest, penalties or additions to tax payable with respect to such Transfer Taxes are due to Power Provider's failure to timely remit any such Transfer Taxes or to file any returns required by the appropriate taxing authority, and Power Provider shall indemnify and hold Purchaser harmless in such excepted cases. If Purchaser shall be required by law to withhold or deduct any Transfer Taxes or other taxes imposed by any jurisdiction or any political subdivision from or in respect of any sum payable hereunder, the sum payable shall be increased as may be necessary so that, after taking all required deductions, Power Provider shall have received an amount equal to the sum it would have received had no such deductions been made. Power Provider will pay for all ad valorem property and other taxes attributable to ownership of the Property, including the percentage of any ad valorem property tax imposed by any taxing authority solely attributable to and derived exclusively from the Fair Market Value of the Solar Power Facility.
- (c) Power Provider will pay and hold harmless Purchaser from any sales or use tax imposed upon Purchaser arising from this Agreement, other than as set forth in the preceding subsection (b), including but not limited to Power Provider's manufacture, installation and acquisition of the Solar Power Facility and the Property.

#### 6. Metering.

(a) Power Provider shall, at its sole cost and expense, provide metering equipment to measure all sales of Electric Power to Purchaser hereunder and shall, at Power Provider's sole cost and expense, regularly but no less than annually have a certified third-party test and as necessary

calibrate such metering equipment for accuracy. The metering equipment for the Solar Power Facility shall be located at or before the Point of Delivery and shall meet or exceed the standards applicable to meters approved for use by electric utilities in the Jurisdiction. Data retrieved from any such meter shall serve as the basis for invoicing Purchaser for all delivered Electric Power. Purchaser may, at its own expense, install metering facilities on Purchaser's side of the Point(s) of Delivery.

- (b) Power Provider's metering equipment shall be sealed and the seals shall be broken only upon occasions when the meters are to be inspected, tested or adjusted by Power Provider. Power Provider shall own the metering equipment that is used to measure sales hereunder, and shall be the only Party authorized to cause seals to be broken on such meters. Representatives of Purchaser shall be offered a reasonable opportunity upon reasonable prior written notice to the Purchaser to be present upon any occasion when the seals for such meters are to be broken and when metering equipment is tested for accuracy. Power Provider and Purchaser may, from time to time, test the metering equipment for accuracy, at their own cost and expense, and Purchaser may use independent third party for testing. At Purchaser's reasonable request, Power Provider will test the metering equipment.
- (c) If any test of the metering equipment of the Solar Power Facility establishes that the metering equipment is not accurate, Power Provider shall repair, replace or adjust the metering equipment at Power Provider's sole cost and expense and shall make an appropriate adjustment in Purchaser's billing, for the entire period of inaccuracy of the meter measured from the date that the inaccuracy began; provided, such period shall not exceed one (1) year from the date such inaccuracy is determined. If such date cannot be determined to the reasonable satisfaction of both Parties, the billing adjustment shall be made for the last one-half of the period not to exceed one (1) year between the date of the last prior successful meter test and the date of the current test disclosing the inaccuracy.
- (d) If either Party believes that there has been a meter failure or interruption, it shall immediately notify the other Party and in any event, to be effective and trigger the adjustment procedure in this Section 6(d), such notice must be delivered to the other Party no later than one (1) year after such failure or interruption. Should a meter be determined to have failed to operate at any time, the quantities of Electric Power to be billed for such period of meter failure will be equal to the average monthly quantity of Electric Power provided by Power Provider to Purchaser that was subject to such meter during the twelve (12) months preceding such failure or interruption, or for the entire period the Solar Power Facility generating such Electric Power has been in Commercial Operation if the period preceding such failure or interruption is less than twelve (12) months.

#### 7. Contract Term; Early Termination by Power Provider or Purchaser.

(a) This Agreement shall be effective as of the Execution Date and shall remain in effect, unless sooner terminated in accordance with its terms, until the expiration of the Contract Term, which shall be limited to the Initial Term unless the Purchaser and Power Provider have agreed to a Renewal Term in accordance with the provisions of this Agreement.

- (b) Power Provider shall have the right, but not the obligation, to terminate this Agreement upon the occurrence of any of the following:
- (i) prior to the Commercial Operation Date, an unstayed order of a court or administrative agency having the effect of subjecting the sales of Electric Power to federal or state regulation of prices and/or service;
- (ii) prior to the Commercial Operation Date, material elimination or alteration of one or more Environmental Incentives (except reduction of the ITC) or other material adverse change in law, rule or regulation that results or could result in a severe adverse economic effect on the Solar Power Facility;
- (iii) prior to the Commercial Operation Date, if the Solar Power Facility does not qualify for the Tariff.
- (c) In the event that Power Provider terminates this Agreement prior to the Commercial Operation Date pursuant to Section 7(b), this Agreement shall terminate without triggering the default provisions of this Agreement and with no liability of Purchaser or Power Provider, and no further obligation to perform under this Agreement except as to those terms and conditions which expressly survive termination.
- (d) Purchaser may terminate this Agreement at any time and for any reason prior to the expiration of the Initial Term by delivering to Power Provider 60 days' prior written notice and the applicable early termination fee as set forth on Schedule 2. In the event that Purchaser terminates this Agreement pursuant to this Section 7(d), this Agreement shall terminate without triggering the default provisions of this Agreement and with no liability of Purchaser (other than the obligation to pay the termination fee) or Power Provider, and Provider shall cause the Solar Power Facility to be disconnected and removed from the Property.
- (e) Nothing in this Section 7 shall supplant Purchaser's other rights of termination set forth in Section 5(a) and in the default provisions of Section 16, which, if applicable, allow Purchaser to terminate this Agreement with no obligation to pay the termination fee.

# 8. Purchaser's End of Contract Term Options; Option to Purchase; Fair Market Value

(a) Subject to the terms of this Agreement, upon the expiration of the Contract Term Purchaser may elect, by providing written notice to Power Provider of its intent between three hundred sixty-five (365) days and ninety (90) days prior to the expiration of the Contract Term, to extend the Contract Term for two separate periods of up to 5 years (each, a "Renewal Term"). Provided no Event of Default by Purchaser has occurred and be continuing under this Agreement, unless such Event of Default has been waived in writing by Power Provider or cured by Purchaser, the Parties may agree to enter into a Renewal Term, and if the Parties so agree, the Parties will mutually agree upon a rate for Electric Power delivered to Purchaser pursuant to this Agreement. Notwithstanding anything in this Agreement to the contrary, in no event shall Purchaser have any obligation to renew or extend the term of this Agreement beyond the Initial Term.

- (b) At the end of the Contract Term, so long as Purchaser is not in material default under this Agreement, Purchaser shall have the option to purchase the Solar Power Facility for a purchase price equal to the greater of two million-one hundred fifty-nine thousand and seventy-nine dollars (\$2,525,000) or the Fair Market Value of the Solar Power Facility as of the date of the transfer of title to the Solar Power Facility or such other amount agreed to by the Parties in writing. If Purchaser desires to purchase the Solar Power Facility it shall notify Power Provider of its intent to purchase between three hundred sixty-five (365) and ninety (90) days prior to the expiration of the Contract Term and the purchase shall be completed prior to the end of the Contract Term
- (c) Fair Market Value of the Solar Power Facility shall be determined by the mutual agreement of the Parties; provided, however, if the Parties cannot agree to a Fair Market Value within thirty (30) days after Purchaser has delivered to Power Provider a notice of its intent to purchase the Solar Power Facility, the Parties shall select a nationally recognized independent appraiser with experience and expertise in the photovoltaic industry to determine the Fair Market Value of the Solar Power Facility. Such appraiser shall act reasonably and in good faith to determine the Fair Market Value of the Solar Power Facility on an installed basis and shall set forth such determination in a written opinion delivered to the Parties. The valuation made by the appraiser will be binding upon the Parties in the absence of fraud or manifest error. The costs of the appraisal shall be borne by the Parties equally. The fact that an appraisal has been conducted pursuant to this Section 8(c) shall not require the Purchaser to purchase the Solar Power Facility from Power Provider, or Power Provider to sell the Solar Power Facility to Purchaser.

#### 9. Environmental Attributes.

- (a) Notwithstanding the Solar Power Facility's presence on the Property and method of attachment thereto, Power Provider shall own, and may assign or sell all right, title and interest associated with or resulting from the development and installation of the Solar Power Facility or the production, sale, purchase or use of the Electric Power including, without limitation:
  - (i) all Environmental Incentives and all Environmental Attributes; and
- (ii) the Reporting Rights and the exclusive rights to claim that: (A) the Electric Power was generated by the Solar Power Facility; (B) Power Provider is responsible for the delivery of the Electric Power to the Point of Delivery; (C) Power Provider is responsible for the reductions in emissions of pollution and greenhouse gases resulting from the generation of the Electric Power and the delivery thereof to the Point of Delivery; and (D) Power Provider is entitled to all credits, certificates, registrations, etc., evidencing or representing any of the foregoing.
- (b) Purchaser shall at Power Provider's sole cost and expense take, upon request of and reasonable advance notice from Power Provider, all reasonable measures to assist Power Provider in obtaining all Environmental Incentives and Environmental Attributes currently available or subsequently made available in connection with the Solar Power Facility.
- 10. Conditions Precedent. The obligations of Power Provider under this Agreement to construct, install and operate the Solar Power Facility and to sell Electric Power generated by the

Solar Power Facility to Purchaser, and Purchaser's obligations accept delivery of and pay for such Electric Power, shall be conditioned on the occurrence of all of the following conditions:

- (a) Purchaser and Power Provider, as the case may be, shall have received all approvals, contracts, agreements, authorizations, consents, ratifications, waivers, exceptions, exemptions and permits from a Governmental Authority, including any discretionary approval from Purchaser that may be needed in the event the Purchaser is the lead or responsible agency with respect to a local, state or federal permit or approval, or other third party including the Utility, as are required for Power Provider to construct, install, operate and maintain the Solar Power Facility at the Property, and to deliver the Electric Power and for Purchaser to Purchase Electric Power and receive corresponding Bill Credits from the Utility, without condition, or with conditions in form and substance acceptable to Power Provider in its sole discretion, provided it is Power Provider's sole responsibility and it has used best efforts to obtain receipt of the same;
- (b) Prior to the Commercial Operation Date, the Purchaser shall have entered into the Interconnection Agreement with the Utility, with the final exhibits to such Interconnection Agreement and any conditions imposed on the Purchaser therein and in this Agreement having been determined in form and substance to be acceptable by the Purchaser in its sole discretion;
- (c) Prior to the Commercial Operation Date, Purchaser and Power Provider, as the case may be, shall have received all authorizations, exceptions, exemptions and permits from a Governmental Authority needed, including any discretionary approval from Purchaser that may be needed in the event that Purchaser is the lead or responsible agency with respect to a local, state or federal permit or approval, for Power Provider to sell Electric Power to Purchaser under this Agreement without economic, financial or other regulation, or with a degree of regulation that is acceptable to Power Provider in its sole discretion, provided it is Power Provider's sole responsibility and it has used best efforts to obtain receipt of the same;
- (d) Power Provider shall have obtained all (A) financing for the installation of the Solar Power Facility and (B) incentive credits (except reduction of the ITC) or grants for the operation of the Solar Power Facility, as Power Provider reasonably determines are acceptable, provided it is Power Provider's sole responsibility and it has used best efforts to obtain the same;
- (e) Prior to the Commercial Operation Date, no material adverse change in the tax or state rebate programs or other change in law (except reduction of the ITC) that materially and adversely impacts Power Provider's economic benefit under this Agreement;
- (f) Power Provider being financially sound as determined by Purchaser in its sole discretion after receipt of either of the following prior to the Commercial Operation Date: (i) Power Provider's audited financial statements for the last three years, or (ii) a commitment letter from Lender certifying that the Lender is financing the Solar Power Facility. In addition to the foregoing, Power Provider shall deliver to Purchaser other financial information pertaining to Power Provider or its affiliates as may be requested by Purchaser.
- (g) Power Provider shall have received executed copies of all agreements that, in Power Provider's sole discretion, are required for Utility interconnection of the Solar Power Facility,

including without limitation, the Interconnection Agreement, provided it is Power Provider's sole responsibility and it has used best efforts to obtain receipt of the same;

- (h) No claim or legal action has been presented or filed challenging the validity of this Agreement or the environmental review or permits or approvals relating to this Agreement within the legal period to do so as reasonably determined by Purchaser, which condition precedent the Purchaser may waive in its sole discretion;
- (i) Power Provider has paid or reimbursed Purchaser, as applicable, for all incurred and reasonably anticipated costs and expenses of Purchaser, including deposits for environmental review, that are the sole responsibility of Power Provider to pay under this Agreement, including without limitation, the costs and expenses of environmental review and of obtaining all permits and approvals relating to this Agreement including without limitation those needed for Power Provider to construct, install, operate and maintain the Solar Power Facility at the Property, and to deliver the Electric Power to Purchaser; and
- (j) Prior to the Commercial Operation Date, the parties shall define the "Property" and update Schedule 8 to this Agreement. From the Effective Date until the Parties have finalized the definition of Property, Purchaser hereby grants to Provider a license containing all the rights necessary for Provider to use and occupy portions of the Site for the installation of the Solar Power Facility pursuant to the terms of this Agreement, including ingress and egress rights to the Site for Provider and its employees, contractors and subcontractors;
- (k) The representations and warranties of Purchaser set forth in this Agreement shall be true and correct in all material respects when made and as of the date that all other conditions precedent set forth in this Section 10 have been satisfied.

#### 11. Billing and Payment.

- (a) Power Provider shall provide Purchaser an invoice on or about the first day of each month for Electric Power delivered to Purchaser during the previous calendar month and for any other charges due and payable to Power Provider under this Agreement. If the Acknowledgement Date occurs on a day other than the first day of a calendar month, Power Provider shall provide Purchaser an invoice for Electric Power delivered to Purchaser during the period between such Acknowledgement Date and the last day of the calendar month that includes the Acknowledgement Date.
- (b) Each Party shall pay any invoice payable by such Party within forty-five (45) calendar days after receipt thereof except for any amount thereof disputed by the owing Party. For the avoidance of doubt, Purchaser is responsible for the invoices set forth in Section 11(a), and Power Provider is responsible for the invoices set forth in Section 3(d).
- (c) Except as provided in Section 6(c), in the event either Party disputes any element of an invoice, written notice of any dispute with respect to any invoice shall be made within 90 days after such Party's receipt of such invoice. If the Party fails to provide the other Party with written notice of a dispute regarding an invoice within such ninety (90) day period, it shall

thereafter be precluded from disputing said invoice. The Parties shall discuss any such billing disputes in good faith for 90 days prior to any dispute resolution procedures set forth in Section 24 (d).

(d) If either Party shall fail to make any payment required by this Agreement when due, including disputed portions of invoices, the amount unpaid shall bear interest at the Interest Rate from the date first due until the obligation is discharged. If the due date of any payment falls on a Sunday or bank holiday, the next business day following the due date shall be the last day on which payment can be made without assessment of interest. Any overpayments by Purchaser shall be retained by Power Provider and applied to the following month's invoice, and Power Provider shall promptly return all overpayments not so applied upon the termination or expiration of this Agreement.

#### 12. Ownership of and Title to the Solar Power Facility and Other Property Rights.

- (a) Power Provider shall at all times retain title to and be the legal and beneficial owner of the Solar Power Facility and all alterations, additions or improvements made thereto and replacements thereof by Power Provider, and the Solar Power Facility shall remain the property of Power Provider or Power Provider's assigns. Power Provider shall be entitled to, and is hereby authorized to, file one or more precautionary financing statements or fixture filings in such jurisdictions as it deems appropriate with respect to the Solar Power Facility in order to protect its rights in the Solar Power Facility. Purchaser acknowledges and agrees that Power Provider may be required to grant or cause to be granted to a lender a security interest in the Solar Power Facility and Purchaser expressly disclaims and waives any rights it may have in the Solar Power Facility, at any time and from time to time, pursuant to this Agreement, at law or in equity.
- (b) The parties specifically acknowledge and agree that Power Provider shall be the owner of the Solar Power Facility for federal income tax purposes, and in that connection, shall be entitled to the depreciation deductions associated with the Solar Power Facility as well as any tax credits or other tax benefits (including cash grants) provided under the Code to which the owner of the Solar Power Facility may be entitled.
- (c) Nothing in this Agreement shall be construed to convey to Purchaser a license or other right to trademarks, copyrights, technology or other intellectual property of Power Provider.

#### 13. Access to Property, Grant of Non-Exclusive License.

(a) Purchaser hereby grants to Provider (i) an exclusive license to the array area which will be fenced in and (ii) a non-exclusive license to the access and utility routes, and both of the aforementioned licenses will be coterminous with the Term containing all the rights necessary for Provider to use and occupy portions of the Property for the installation, operation, maintenance and removal of the Solar Power Facility pursuant to the terms of this Agreement, including ingress and egress rights to the Property for Provider and its employees, contractors and subcontractors and access to electrical panels and conduits to interconnect or disconnect the Solar Power Facility with the Property's electrical wiring. If Provider's financing structure requires that Purchaser enter into a License Agreement

directly with Financing Party, Purchaser shall enter into such an agreement which shall be in a form set forth by Provider and which contain substantially the same rights as set forth in this Section 13.

- (b) Regardless of whether Purchaser is owner of the Property or leases the Property from a landlord, Purchaser hereby covenants that (i) Provider shall have access to the Property and Solar Power Facility during the Term of this Agreement and for so long as needed after termination to remove the Solar Power Facility pursuant to the applicable provisions herein, and (y) neither Purchaser nor Purchaser's landlord will interfere or handle any Provider equipment or the Solar Power Facility without written authorization from Provider..
- (c) At request of Provider, Purchaser shall execute a Memorandum of License, and which shall be in form and substance set forth Exhibit A, or other form agreed to by the parties. Provider may, at its sole cost and expense, record such Memorandum of License with the appropriate land registry or recorder's office.
- (d) Notwithstanding anything to the contrary in the Agreement, Purchaser shall operate and maintain the Property to comply with the requirements of all applicable Environmental Laws that limit or govern the conditions or uses of the Property, without impairing or interfering with Provider's construction, operation and ownership of the Solar Power Facility or occupancy of the Property. In no event shall Provider have any liability or obligation with respect to any Pre-Existing Environmental Condition on, in or under the Property, or operations or maintenance of the Property required to comply with Environmental Laws with respect to Pre-Existing Environmental Conditions.
- (e) Purchaser shall indemnify, hold harmless and defend Provider from and against all claims, pay costs and expenses, and conduct all actions required under Environmental Laws in connection with (i) the existence at, on, above, below or near the Property of any Pre-Existing Environmental Conditions, and (ii) any Hazardous Materials released, spilled or deposited at, on above or below the Property by the Purchaser.

#### 14. Assignment; Rights of Lenders.

(a) Purchaser shall not assign this Agreement or any of its rights or obligations hereunder without the prior written consent of Power Provider which consent shall not be unreasonably withheld. Power Provider may assign this Agreement or any of its rights or obligations hereunder without Purchaser's consent, including without limitation to any Affiliate of Power Provider; provided, that, Power Provider shall give notice to Purchaser of any such assignment as soon as practicable thereafter and provided that the assignee is a "Qualified Assignee" and shall be able to reliably, successfully and capably fulfill the terms of this Agreement as reasonably determined by the Purchaser in its sole discretion; provided, further, that, Power Provider may collaterally assign this Agreement to a Lender for the limited purpose of securing the Lender's financing of some or all of the Solar Power Facility without the consent of Purchaser by providing written notice to Purchaser. Prior to any assignment, Power Provider shall use commercially reasonable efforts to provide Purchaser with audited financial statements of the proposed assignee for the prior three (3) years and provide Purchaser will at least forty (45) days to review such statements. If Power Provider collaterally assigns this Agreement or its rights hereunder to a Lender, Purchaser at the sole cost and expense of Power Provider shall execute any

consents reasonably required by such Lender to effect an assignment of the Agreement as collateral, and if requested by such Lender, shall provide such notice and cure rights with respect to Power Provider defaults as such Lender may reasonably request. Any purported assignment made in violation of this Section 14(a) shall be deemed void. For the avoidance of doubt, any assignment of the membership interests in Power Provider shall not be deemed an assignment under this Agreement and shall not be subject to the terms and conditions of this Section 14(a).

- With respect to a collateral assignment by Power Provider to a Lender in (b) accordance with Section 14(a), Purchaser and Power Provider acknowledge and agree that, upon receipt of written notice and direction by any Lender of Power Provider that Power Provider is in default under its financing agreements with Lender, and notwithstanding any instructions to the contrary by Power Provider, Purchaser shall (i) make any and all payments due and owing by Purchaser under this Agreement directly to Lender, and (ii) tender performance of any and all other covenants by Purchaser under this Agreement to and for the benefit of Lender and as the Lender may direct in the future. Furthermore, if directed in writing by Lender, Purchaser will recognize such Lender, or any third party to whom such Lender has reassigned the rights of Power Provider under this Agreement, as the proper and lawful Power Provider of power under this Agreement and fully entitled to receive payments with respect thereto and possessing all other rights of the Power Provider hereunder so long as such Lender (or its assignee or designee) performs the obligations of Power Provider hereunder, including the right to assign this Agreement to a third party in accordance with and subject to the conditions in Section 14(a). Purchaser shall be protected and shall incur no liability in acting or proceeding in good faith upon any such foregoing written notice and direction by Lender which Purchaser shall in good faith believe (i) to be genuine and (ii) a copy of which to have been delivered to Power Provider. Purchaser shall be under no duty to make any investigation or inquiry as to any statements contained or matters referred to in any such foregoing notice and direction, but may accept and rely upon them as conclusive evidence of the truth and accuracy of such statements.
- (c) In the event Power Provider notifies Purchaser of a Lender, whether or not such Lender is the beneficiary of an assignment, then Purchaser shall comply with the provisions set forth in <u>Schedule 5</u> of this Agreement and agrees to provide such estoppels and acknowledgments as Provider may reasonably request from time to time.

#### 15. Confidentiality.

- (a) Unless expressly approved by a Party or otherwise expressly permitted under this Agreement, the other Party shall not use, or permit others to use, such Party's or its Affiliates' name, brand or logo in any documentation, advertising or marketing materials or other public displays.
- (b) It may be necessary for each Party to provide the other Party information necessary to permit performance of their respective obligations hereunder. The Parties agree that all information including cost estimates, financial and other information provided by the other Party, which is clearly marked as confidential or proprietary, will be held in strict confidence, and upon the expiration or earlier termination of this Agreement, the Parties and their respective officers, employees, agents, advisors and representatives, will continue to hold such information in

confidence and will promptly return such confidential documents provided by the other Party. The Parties' obligations to treat such information as confidential shall terminate at the expiration of five (5) years from the termination of this Agreement. Nothing in this Agreement shall limit either Party's use or disclosure of information which:

- (i) is generally known or available on an unrestricted basis to the public or becomes so known or available on an unrestricted basis through no fault of the receiving Party;
- (ii) is in the receiving Party's possession without restriction as to its use or disclosure prior to its receipt from the disclosing Party;
- (iii) is acquired by the receiving Party on an unrestricted basis from any third party; <u>provided</u>; <u>that</u>, the disclosing Party does not know or have reason to know, or is not informed subsequent to disclosure by such third party and prior to disclosure by the disclosing Party, that such information was acquired under an obligation of confidentiality;
- (iv) information that was developed by or for the receiving Party independently of and without reference to the information of the disclosing Party; or
- (v) is required to be disclosed pursuant to applicable law, including without limitation the California Public Records Act and Brown Act (Gov't Code §§ 6250 and 54950, et seq., respectively), or by any governmental authority with appropriate jurisdiction in the circumstances.
- (c) The Parties will endeavor to restrict distribution of material designated as confidential to only those individuals involved in the administration of this Agreement. The Parties will provide each other with five (5) days written notice of any request for disclosure of such material.
- (d) The Parties agree that in the event a Party materially breaches its obligations under this Section 15, the non-breaching Party shall be entitled to such relief as may be available at law or equity.

#### 16. Events of Default; Remedies.

- (a) The occurrence of any of the following events shall constitute an "Event of Default":
- (i) a Party's failure to make any payment required by this Agreement within forty-five (45) business days after receipt of written notice from the other Party that a payment which is due has not been received;
- (ii) a Party's failure to observe and perform any other material obligation under this Agreement and continuance of such failure for a period of forty-five (45) days after receipt of written notice specifying the nature of such default and demanding that it be remedied;

- (iii) a Party's material breach of this Agreement including, but not limited to, Power Provider's failure to pay for costs and expenses for which it is solely responsible to pay or reimburse Purchaser for, as applicable, Power Provider's unauthorized assignment of this Agreement or its rights under this Agreement, or Power Provider's failure to materially comply with any approvals, contracts, agreement, authorizations, consents, ratifications, waivers, exceptions, exemptions or permits from a Governmental Authority or other third party including Purchaser (if applicable), or laws or regulations including the Tariff, applicable to the construction, installation, operation or maintenance of the Solar Power Facility at the Property or delivery of Electric Power to Purchaser, and such breach is not cured within forty-five (45) days after receipt of notice from the non-defaulting Party;
- (iv) a Party's filing, or consent by answer or otherwise to the filing against a Party of, a petition for relief, reorganization, or arrangement or any other petition in bankruptcy, for liquidation or to take advantage of any bankruptcy or insolvency law of any jurisdiction;
- (v) a Party's general assignment for the benefit of creditors or consent to the appointment of a custodian, receiver, trustee or other officer with similar powers of itself or of any substantial part of its properties;
- (vi) a Party is adjudicated insolvent, liquidated, dissolved, or ceases doing business, Purchaser shall have a right of first refusal, subject to any rights of the Lenders under this Agreement, to purchase the Solar Power Facility and Property on identical terms to a bona fide offer from a third party;
- (vii) a court or other governmental authority of competent jurisdiction shall enter an order appointing a custodian, receiver or trustee, or an officer with similar powers, with respect to a Party or any substantial part of any of its properties; or an order for relief shall be entered in any case or proceeding for liquidation or reorganization, or otherwise to take advantage of any bankruptcy or insolvency law of any jurisdiction, relative to that Party or ordering the dissolution, winding-up or liquidation of the Party; or a petition for such relief is filed against a Party and not dismissed or stayed within sixty (60) calendar days; or
- (viii) a Party's representation made in this Agreement is not correct and true in any material respect, and such breach is not cured within thirty (30) days after receipt of notice from the non-defaulting Party.
- (b) Except for the occurrence of any of the event described in Section 7(b)(iv) above for which there shall be no right to cure, if an Event of Default as described above has occurred the non-defaulting Party shall have the right, on written notice to the defaulting Party, to pursue all remedies available to it at law or in equity, including, but not limited to, the right to terminate this Agreement, if such default shall continue unremedied for a period of 30 days (or 45 days if specified above) after written notice thereof has been given to the defaulting Party; provided, however, that if (i) such default cannot reasonably be cured within such 30 day or 45 day period (as applicable), (ii) such default is susceptible of cure and could not be reasonably be expected to have a material adverse effect on the non-defaulting Party, (iii) the passage of time could not reasonably be expected to have an adverse impact on the non-defaulting Party, (iv) the defaulting

Party is proceeding with diligence and in good faith to cure such default and (v) the non-defaulting party reasonably consents to an extension based upon clauses (i) - (iv) immediately above, then such 30 day or 45 day cure period, as applicable, shall be extended to such date, not to exceed a total of 180 days from the initial default.

- (c) The Parties agree that if Power Provider terminates this Agreement as a result of an Event of Default by Purchaser, Purchaser shall pay Power Provider a termination fee in accordance with Schedule 2 attached hereto.
- (d) The Parties agree that if Purchaser terminates this Agreement as a result of an Event of Default by Power Provider, Purchaser may exercise any other remedies available at law or equity or as expressly provided under this Agreement.
- (e) Upon the termination of this Agreement or the expiration of the Contract Term, Provider shall cause the Solar Power Facility to be disconnected and removed from the Property no later than one hundred eighty (180) days after such expiration or termination. Purchaser shall provide Power Provider with reasonable access to perform such removal.

### 17. Limitations of Liability.

Except if otherwise provided in this Agreement, neither Party shall be liable for any special, incidental, consequential or punitive damages based on breach of contract, breach of warranty, negligence, tort or any other legal theory. The Parties agree that any express remedy or calculation of liability expressly provided for in this Agreement, such as the termination fee set forth in Schedule 2, does not constitute special, incidental, consequential or punitive damages. Purchaser's and Power Provider's maximum liability under this Agreement shall be limited to the aggregate amounts due for Electric Power remaining in the Contract Term on the date of the events giving rise to such liability; provided, that, the limit shall not apply to claims related to (i) indemnity obligations in respect of third party personal injury, intellectual property infringement or environmental claims or (ii) any obligation of Purchaser to pay the amounts due for Electric Power or the termination fee, if applicable, set forth in Schedule 2. Notwithstanding anything to the contrary in this Agreement, prior to the Commercial Operation Date, Power Provider shall not have any liability under this Agreement except for any reimbursements owed to Purchaser under this Agreement including, but not limited to, pursuant to Section 3(d). Nothing in this Section 17 shall be deemed a waiver by either Party of any remedies at law or equity available to a Party under this Agreement.

### 18. Force Majeure.

- (a) Neither Party shall be deemed to be in breach of this Agreement and no Event of Default shall be deemed to occur under this Agreement to the extent that such Party's delay or failure in the performance of its obligations under this Agreement (other than the obligation to pay money) is due to an event of Force Majeure.
- (b) The Party claiming an event of Force Majeure shall (i) give the other Party reasonably prompt written notice describing the particulars of the occurrence; (ii) suspend

performance for no greater scope and no longer duration than is required by the event of Force Majeure; (iii) use its reasonable commercial efforts to remedy its inability to perform; and (iv) when able to resume performance of its obligations under this Agreement, give the other Party written notice to that effect.

#### 19. Legal Effect of Contract

- (a) Without limiting the applicability of any other provision of the U.S. Bankruptcy Code as amended (the "Bankruptcy Code"), the Parties acknowledge and agree that (i) this Agreement constitutes a "forward contract" as defined in Section 101 (25) of the Bankruptcy Code, (ii) Purchaser and Power Provider are forward contract merchants, (iii) that the rights of the Parties under the termination provisions of this Agreement will constitute contractual rights to liquidate transactions hereunder, (iv) that any payment related thereto will constitute a "settlement payment" as defined in Section 101 (51A) of the Bankruptcy Code, and (v) that the Parties are entitled to the rights under, and protections afforded by, Sections 362, 546, 556, and 560 of the Bankruptcy Code.
- (b) The Parties acknowledge and agree that, for accounting or tax purposes, this Agreement is not and shall not be construed as a lease and, pursuant to Section 7701(e)(3) of the Code, this Agreement is and shall be deemed to be a service contract with respect to the sale to the Purchaser of electric energy produced at an alternative energy facility.

#### 20. Indemnification.

To the extent allowed by law, each Party (each, an "Indemnifying Party") shall, to the extent permitted under law, indemnify, defend and hold harmless the other Party, its employees, directors, officers, managers, members, shareholders, subsidiaries and agents (each, an "Indemnified Party") from, against and in respect of all liabilities, losses, lawsuits, penalties, claims, settlement payments, costs and expenses, interest, awards, judgments, damages, fines or demands (including the costs, expenses and reasonable attorneys' fees on account thereof) to the extent arising out of or related to the Indemnifying Party's (i) material breach of any covenant, obligation, representation, or warranty set forth in this Agreement and/or (ii) negligence or willful misconduct (collectively, "Indemnity Claims"). Notwithstanding the preceding, however, the Indemnifying Party will not have any obligation to indemnify the Indemnified Party from or against any Indemnity Claims to the extent caused by, resulting from, relating to or arising out of the negligence or intentional misconduct of the Indemnified Party or any of its directors, officers, employees or agents. An Indemnified Party shall notify the Indemnifying Party promptly of any written claims or demands against the Indemnified Party from a third party for which the Indemnifying Party is responsible hereunder. The indemnities in this Agreement shall be in addition to and not in lieu of any other indemnity obligations provided by law and shall not be limited by the insurance provisions set forth on Schedule 6 or insurance proceeds. The indemnity provided in this Section 20 also shall apply to the successors and permitted assigns of the Indemnified Party including any Lender. This Section 20 shall survive the expiration or termination of this Agreement.

- (b) Notwithstanding the above, neither Purchaser nor Power Provider shall be required to defend, indemnify and hold the other harmless for the latter's own negligent acts, omissions or willful misconduct. It is the intent of the Parties that where negligence is determined to have been joint or contributory, principles of comparative negligence will be followed, and each Party shall bear the proportionate cost of any loss damage, expense or liability attributable to that Party's negligence.
- (c) Notwithstanding anything in this Agreement to the contrary, in the event of any liabilities, losses, lawsuits, penalties, claims, settlement payments, costs and expenses, interest, awards, judgments, damages, fines or demands (including the costs, expenses and reasonable attorneys' fees on account thereof) against the Purchaser, or its employees, directors, officers, managers, members, shareholders, subsidiaries or agents, to the extent related to any environmental violation, including but not limited to the California Environmental Quality Act (Public Resources Code section 21000 et seq.) (CEQA), that arises as a result of this Agreement, Power Provider shall defend, indemnify and hold the Purchaser harmless from and against such claim or legal action including, but not limited to, for the Purchaser's costs and expenses including attorney fees and expert costs arising from or relating to any such claim or legal action including without limitation the defense thereof.

#### 21. Representations and Warranties.

- (a) Each Party represents and warrants that it is, and during the term of this Agreement shall remain, duly organized, validly existing and in good standing under the laws of its state of organization.
- (b) Each Party represents that it has the power and authority to execute and deliver this Agreement, perform its obligations hereunder and to consummate the transactions contemplated hereby.
- (c) Each Party represents and warrants that the execution and delivery of this Agreement and the performance of such Party's obligations have been duly authorized by all necessary action.
- (d) Each Party represents and warrants that this Agreement has been duly and validly executed and delivered and constitutes the valid, legal and binding obligation of such Party enforceable in accordance with its terms.
- (e) Each Party represents and warrants that, to such Party's knowledge, neither the execution and delivery of this Agreement by such Party nor compliance by such Party with any of the terms and provisions of this Agreement conflicts with, breaches or contravenes the provisions of such Party's organizational documents or any other applicable law or regulation.
- (f) Each Party represents and warrants that, to such Party's knowledge, no approvals, contracts, agreements, authorizations, consents, ratifications, waivers, exceptions, exemptions and permits from any governmental body or other third party, other than those which have been previously obtained or disclosed in writing to the other Party is required in connection with the

due authorization, execution and delivery of this Agreement by such Person or the performance of such Party of its obligations hereunder which such Party has reason to believe that it will be unable to obtain in due course.

- (g) Each Party represents and warrants that, to such Party's knowledge, it is not in violation of any applicable law or any judgment entered by any federal, state or local governmental authority, which violations or judgments, individually or in the aggregate, would reasonably be expected to have a material adverse effect on that Party's ability to perform its obligations under this Agreement or the transactions contemplated hereby.
- (h) Each Party represents and warrants that there are no actions, suits, governmental investigations or inquiries, or proceedings pending, or to each Party's knowledge threatened, against it or any of its businesses that, if determined adversely to it, would reasonably be expected to have a material adverse effect on its ability to perform its obligations under this Agreement.
- (i) Each Party represents and warrants that it is solvent and there are no bankruptcy, insolvency, reorganization, receivership or other arrangement proceedings pending or being contemplated by it or, to its knowledge, threatened against it.
- (j) Purchaser represents and warrants that it is not a "foreign person" or (only with respect to Power Provider) "tax-exempt entity" (as such terms are defined in Section 168(h) of the Code), and it will not assign, subcontract or otherwise transfer its rights under this Agreement to a "foreign person" or (only with respect to Power Provider), a "tax-exempt entity" as defined in Section 168(h) of the Code.
- (k) Each Party represents and warrants that, to such Party's knowledge, there are no facts, circumstances or other matters that may interfere with or delay the construction and installation of the Solar Power Facility, except as have been disclosed in writing to the other Party.
- (l) Purchaser represents and warrants that the execution, delivery and performance of this Agreement does not and will not during the term of this Agreement, violate, breach or conflict with any other agreement of Purchaser, including Purchaser's agreements with creditors, lessors, mortgagees, other electric utilities, or energy suppliers.
- (m) Purchaser represents and warrants that it has no actual knowledge the Property is not in compliance with Environmental Laws, and that Purchaser holds and is in compliance with all Governmental Approvals required for the ownership and any current operations or activities conducted at the Premises.
- (n) Notwithstanding the above representations and warranties and anything in this Agreement to the contrary, Purchaser makes no representations or warranties with respect to whether Purchaser can or is authorized by law to meet the requirements of the Tariff or Interconnection Agreement, what permits or approvals may needed from any Governmental Authority, or what environmental review, if any, may be required for performance of the obligations, transactions or activities contemplated by this Agreement by Power Provider or Purchaser, which permits, approvals and review shall be the sole responsibility and at the sole cost

and expense of Power Provider. Nothing in this Agreement commits or requires Purchaser to approve any project under CEQA and Purchaser retains full discretion to consider and adopt mitigation measures and alternatives including the alternative of not going forward with any project and the Purchaser's actions taken to comply with CEQA shall not constitute a breach of this Agreement.

PURCHASER AND POWER PROVIDER MAKE NO REPRESENTATIONS OR WARRANTIES OTHER THAN THOSE EXPRESSLY SET FORTH IN THIS AGREEMENT, AND EXPRESSLY DISCLAIMS ALL OTHER WARRANTIES, EXPRESSED OR IMPLIED, INCLUDING WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

#### 22. Notices.

All notices, requests, demands, invoices or other communications given, delivered or made under this Agreement shall be in writing and will be delivered by personal delivery, registered or certified mail, in each case, return receipt requested and postage prepaid, or nationally recognized overnight courier, to the address for notices set forth on the signature pages hereto. Such notice shall be deemed received upon receipt as indicated by the date on the signed receipt. A Party may change the address shown on its signature page hereto upon ten (10) days' prior written notice given in accordance with this Section 22.

#### 23. Intentionally Deleted.

#### 24. Miscellaneous.

- (a) <u>Amendments</u>. Changes in, or additions to this Agreement or to the Schedules may only be by a writing executed by each of the Parties.
- (b) <u>Waivers</u>. Any failure of any Party to enforce any of the provisions of this Agreement or to require compliance with any of its terms at any time during the pendency of this Agreement shall in no way affect the validity of this Agreement, or any part hereof, and shall not be deemed a waiver of the right of such Party thereafter to enforce any and each such provision. No waiver of any provision of this Agreement shall be effective unless in writing signed by the waiving Party.
- (c) <u>Governing Law</u>. This Agreement shall be deemed a contract made under the laws of the Jurisdiction and, together with the rights and obligations of the parties hereunder, shall be construed under and governed by the laws of the Jurisdiction without reference to its principles of conflicts of laws.
- (d) <u>Mediation.</u> Before bringing any action in any venue arising out of a dispute in connection with this Agreement, the Parties shall first participate in good faith in a mediation of such dispute. The Party or Parties seeking redress of such a dispute shall submit a written claim to the other Parties, setting out the basis of the dispute and proposing the name of a mediator. The mediator shall be mutually agreed upon by the Parties and shall be a current member of the California bar with ten (10) years of experience in the subject matter of the dispute, a retired

California judge or a member of a group or association engaged in the business of alternative dispute resolution. If the Parties cannot agree on a mediator, they shall apply to the Superior Court of the county in which the Property is located to have a mediator appointed by the court. The mediation shall be held in a mutually agreeable location within thirty (30) days of the appointment of the mediator. The cost of mediation shall be borne equally by the Parties to the mediation. At least ten (10) business days before the date of the mediation, each Party shall provide the mediator with a statement of its position and copies of all supporting documents. Each Party shall send to the mediation a person who has authority to bind the Party. If the claim will involve third parties, they shall also be asked to participate in the mediation. The mediation and all communications written or oral that are a part thereof shall be confidential and shall be treated as settlement negotiations that shall not be introduced as evidence in any subsequent proceeding. If the mediation fails to resolve the claim, the Parties may proceed with an action in the appropriate venue. Each party shall pay its proportional share of the mediation costs and its own attorney's and other professional fees incurred in connection therewith. Notwithstanding the above, any Party may initiate judicial proceedings for the sole purpose of seeking injunctive relief to prevent irreparable harm, without first engaging in mediation.

- (e) <u>Choice of Forum</u>. Each Party irrevocably and unconditionally: (i) agrees that any suit, action, or other legal proceeding arising out of the Agreement shall be brought exclusively in Fresno County Superior Court; (ii) consents to the jurisdiction of any such court in any such suit, action or proceeding; and (iii) waives any objection which such Party may have to the laying of venue of any such suit, action, or proceeding in Fresno County Superior Court.
- (f) <u>Merger</u>. This Agreement constitutes the entire agreement among the Parties hereto with respect to the subject matter hereof. This Agreement supersedes all prior agreements between the Parties with respect to the subject matter hereof.
- (g) <u>Severability</u>. The invalidity or unenforceability of any provision of this Agreement shall in no way affect the validity or enforceability of any other provision.
- (h) <u>Survival of Provisions</u>. Any obligation of the Parties relating to monies owed, limitations on liability, indemnity and actions, and confidentiality, shall survive termination or expiration of this Agreement.
- (i) <u>Third Party Beneficiaries</u>. Nothing in this Agreement shall provide any benefit to any third party (other than the Lender pursuant to Section 14(b)) or entitle any third party to any claim, cause of action, remedy or right of any kind, it being the intent of the Parties that this Agreement shall not be construed as a third-party beneficiary contract.
- (j) <u>No Partnership</u>. This Agreement is not intended, and shall not be construed, to create any association, joint venture, agency relationship or partnership between the Parties or to impose any such obligation or liability upon either Party. Neither Party shall have any right, power or authority to enter into any agreement or undertaking for, or act as or be an agent or representative of, or otherwise bind, the other Party.
  - (k) <u>Interpretation</u>. In this Agreement:

- (i) The captions and Section headings used herein are for convenience and reference only and shall not have any effect on the construction of this Agreement;
- (ii) All pronouns as used in this Agreement shall be deemed to refer to the singular, plural, masculine, feminine and neuter genders as the context requires or permits;
- (iii) The terms "hereof," "herein," "hereto," "hereunder" and words of similar or like import refer to this entire Agreement and not any particular Section, Schedule, Exhibit or other subdivision of this Agreement;
- (iv) Unless otherwise provided, references to a particular "Section," or "Schedule" are references to that Article or Section of, or Schedule to, this Agreement;
- (v) The words "include," "includes" and "including" shall be deemed to be followed by "without limitation" or "but not limited to";
- (vi) All capitalized terms used but not defined in the Schedules shall have the meaning set forth in this Agreement;
- (vii) The Schedules will be deemed to incorporate all of the provisions of this Agreement; and
- (viii) If a provision in a Schedule conflicts with a provision in this Agreement, the provision of this Agreement will prevail unless the Schedule specifically states that the provision in the Schedule will prevail.
- (l) <u>Counterparts</u>. This Agreement may be executed in multiple counterparts, each of which shall constitute an original, but all of which together shall constitute but one and the same agreement. Signatures transmitted electronically by .pdf or facsimile shall be binding for all purposes hereof.
- (m) <u>Joint Preparation</u>. This Agreement has been negotiated by all Parties hereto with the assistance and input of their respective attorneys, and therefore no ambiguity herein shall be construed for or against any Party based upon the identity of the author of this Agreement or any portion hereof.
- (n) <u>Tax Matters</u>. Notwithstanding any provision to the contrary under this Agreement, neither Purchaser nor any party related to Purchaser shall receive any financial benefit if the operating costs of the Solar Power Facility are less than the standard of performance and/or operation set forth in this Agreement within the meaning of Section 7701(e)(4)(A)(iii) of the Code.
- (o) <u>Article 2A</u>. The Parties acknowledge and agree that this Agreement is not and shall not be construed as a lease under Article 2A of the Uniform Commercial Code ("<u>UCC</u>") and this Agreement is and shall be deemed to be a service contract with respect to the sale to Purchaser of electric energy produced at an alternative energy facility. NOTWITHSTANDING THE FOREGOING, IN THE EVENT THIS AGREEMENT IS CONSTRUED AS A LEASE UNDER

ARTICLE 2A OF THE UCC, PURCHASER HEREBY WAIVE RIGHTS AND REMEDIES CONFERRED UPON A LESSEE BY ARTICLE 2A OF THE UCC.

- (p) <u>Binding Effect</u>. The terms and provisions of this Agreement, and the respective rights, privileges, duties and obligations hereunder of each Party, shall be binding upon, and inure to the benefit of, the Parties and their respective successors and permitted assigns.
- (q) Treatment of Additional Amounts. The Parties acknowledge and agree that the termination fee set forth on Schedule 2 payable by the Purchaser as a result of the Purchaser's default (under Section 16) or Purchaser's right to terminate for convenience (under Section 7(d)) shall constitute liquidated damages and not penalties. The Parties further acknowledge that in each case (i) the amount of loss or damages likely to be incurred is incapable or is difficult to precisely estimate, (ii) the amounts specified hereunder bear a reasonable proportion and are not plainly or grossly disproportionate to the probable loss likely to be incurred by the Power Provider as the case may be, and (iii) the Parties are sophisticated business parties and have been represented by sophisticated and able legal and financial counsel and negotiated this Agreement at arm's length. The Parties agree that the Performance Guaranty payment as set forth on Schedule 5 payable by the Power Provider is a reasonable approximation of the damages suffered by Purchaser as a result of underperformance of the Solar Power Facility, is bargained-for by the Parties, and shall be the Purchaser's sole and exclusive remedy hereunder for underperformance of the Solar Power Facility.
- (r) No Recourse to Affiliates or Persons. This Agreement is solely and exclusively between the Parties, and any obligations created herein on the part of either Party shall be the obligations solely of such Party. No Party shall have recourse to any parent. subsidiary, partner. member, Affiliate, lender, director, officer or employee of the other Party for performance or non-performance of any obligation hereunder, unless such obligations were assumed in writing by the Person against whom recourse is sought.
- (s) <u>Cooperation with Financing</u>. Purchaser acknowledges that Power Provider may be financing the Solar Power Facility and Purchaser agrees that it shall reasonably cooperate with Power Provider and its Lenders in connection with such financing at Power Provider's sole cost and expense, including (i) the furnishing of such information, (ii) the giving of such certificates, (iii) providing such opinions of counsel and other matters as Power Provider and its financing parties may reasonably request, and (iv) considering and negotiating changes or additions to this Agreement that may be reasonably requested by Power Provider's Lenders, provided that, in the reasonable judgment of the Purchaser, such changes do not alter the fundamental economic or other material terms of this Agreement.
- (t) Either Party hereto, without charge, at any time and from time to time, within thirty (30) business days after receipt of a written request by the other Party, shall deliver a written instrument, duly executed, certifying to such requesting Party, or any other Person specified by such requesting Party:

- (i) That this Agreement is unmodified and in full force and effect, or if there has been any modification, that the same is in full force and effect as so modified, and identifying any such modification;
- (ii) Whether or not to the knowledge of any such party there are then existing any offsets or defenses in favor of such party against enforcement of any of the terms, covenants and conditions of this Agreement and, if so, specifying the same and also whether or not to the knowledge of such party the other party has observed and performed all of the terms, covenants and conditions on its part to be observed and performed, and if not, specifying the same; and
  - (iii) Such other information as may be reasonably requested by a Party hereto.

Any written instrument given hereunder may be relied upon by the recipient of such instrument, except to the extent the recipient has actual knowledge of facts contained in the certificate.

[SIGNATURES ON IMMEDIATELY FOLLOWING PAGE]



IN WITNESS WHEREOF, the undersigned have each caused this Solar Services Agreement to be duly executed as of the Execution Date.

POWER PROVIDER:	PURCHASER:
[White Pine Project Company] 1808 Wedemeyer Street, Suite 219 San Francisco, CA 94129 Office: (248) 808-2015	North Kern Water Storage District
By:	By:
Name: Dylan Dupre	Name:
Title: Authorized Person	Title:

Schedule 1
SSA Payment Schedule

Year	Estimated Production (kWh) <sup>1</sup>	PPA Rate (\$/kWh)
Year 1	14,623,000	\$0.076
Year 2	14,549,885	\$0.076
Year 3	14,477,136	\$0.076
Year 4	14,404,750	\$0.076
Year 5	14,332,726	\$0.076
Year 6	14,261,063	\$0.076
Year 7	14,189,757	\$0.076
Year 8	14,118,808	\$0.076
Year 9	14,048,214	\$0.076
Year 10	13,977,973	\$0.076
Year 11	13,908,083	\$0.076
Year 12	13,838,543	\$0.076
Year 13	13,769,350	\$0.076
Year 14	13,700,504	\$0.076
Year 15	13,632,001	\$0.076
Year 16	13,563,841	\$0.076
Year 17	13,496,022	\$0.076
Year 18	13,428,542	\$0.076
Year 19	13,361,399	\$0.076
Year 20	13,294,592	\$0.076
Year 21	13,228,119	\$0.076
Year 22	13,161,978	\$0.076
Year 23	13,096,169	\$0.076
Year 24	13,030,688	\$0.076
Year 25	12,965,534	\$0.076

<sup>&</sup>lt;sup>1</sup> To be updated prior to COD based upon final project design

Schedule 2
SSA Termination Schedule

Year	Termination Fee
1	\$19,874,540
2	\$19,574,163
3	\$19,199,288
4	\$18,804,522
5	\$18,161,380
6	\$16,841,685
7	\$15,975,561
8	\$15,539,215
9	\$15,078,456
10	\$14,591,745
11	\$14,077,209
12	\$13,533,042
13	\$12,957,247
14	\$12,347,760
15	\$11,702,171
16	\$11,018,097
17	\$10,292,926
18	\$9,523,939
19	\$8,708,019
20	\$7,842,030
21	\$6,922,539
22	\$5,303,066
23	\$3,971,308
24	\$3,477,293
25	\$2,880,853

#### Schedule 3

#### **Performance Guaranty**

This Performance Guaranty ("Guaranty") sets forth the terms and conditions of a performance guaranty provided by Power Provider in conjunction with this Agreement. Capitalized terms not otherwise defined herein have the meanings given such terms in the Agreement. The term of this Guaranty will be concurrent with the term of the Agreement; except that it will not exceed the Initial Term. This Guaranty will be updated by Power Provider to reflect the as-built specifications of the Solar Power Facility.

- 1. <u>Guaranty</u>. Power Provider guarantees that during the term of the Agreement the Solar Power Facility will generate not less than the projected generation of the Solar Power Facility as set forth in **Table 1.A** below; provided that the **Table 1.A** values are subject to downward adjustment for weather conditions (such adjusted value, the "<u>Guaranteed kWh</u>").
  - A. Power Provider will use local weather data to determine the Solar Power Facility's Guaranteed kWh, based on the following methods if available and in descending order of preference:
    - (i) satellite data provided by an independent third-party vendor of Power Provider; or
    - (ii) available data from a locally installed weather station at the Property.

**Table 1.A**, projected production values assuming average weather conditions:

Contract Year	Pre-Adjustment Annual KWh
Year 1	10,236,100
Year 2	10,184,920
Year 3	10,133,995
Year 4	10,083,325
Year 5	10,032,908
Year 6	9,982,744
Year 7	9,932,830
Year 8	9,883,166
Year 9	9,833,750
Year 10	9,784,581
Year 11	9,735,658
Year 12	9,686,980
Year 13	9,638,545
Year 14	9,590,352
Year 15	9,542,401

Contract Year	Pre-Adjustment Annual KWh
Year 16	9,494,689
Year 17	9,447,215
Year 18	9,399,979
Year 19	9,352,979
Year 20	9,306,214
Year 21	9,259,683
Year 22	9,213,385
Year 23	9,167,318
Year 24	9,121,481
Year 25	9,075,874

- B. If at the end of each successive Contract Year (set forth in Table 1.A) the AC electricity produced by the Solar Power Facility as measured and recorded by Power Provider (the "Actual kWh") is *less* than the Guaranteed kWh for that Contract Year, then Power Provider shall pay Purchaser an amount equal to (i) the difference between the Guaranteed kWh and the Actual kWh, multiplied by (ii) the Performance Guarantee Payment Rate (as defined in Section 1(D)), in each case with respect to the affected Contract Year. Any such payment payable to Purchaser shall be credited to Purchaser as a credit on the invoice that is submitted by Power Provider at the end of such Contract Year.
- C. If a payment of greater than fifty dollars (\$50) is due under Section 1(B), (i) Power Provider will deliver a statement to Purchaser detailing the Guaranteed kWh and the calculation of the payment due. If no payment is due, then no statement or payment will be issued.
  - D. "Performance Guarantee Payment Rate" means the dollar value per kWh set forth in **Table 1.D** below:

Contract Year	Performance
	Guarantee
	Payment Rate
Year 1	\$0.076
Year 2	\$0.076
Year 3	\$0.076
Year 4	\$0.076
Year 5	\$0.076
Year 6	\$0.076
Year 7	\$0.076
Year 8	\$0.076

Contract Year	Performance
	Guarantee
	Payment
	Rate
Year 9	\$0.076
Year 10	\$0.076
Year 11	\$0.076
Year 12	\$0.076
Year 13	\$0.076
Year 14	\$0.076
Year 15	\$0.076
Year 16	\$0.076
Year 17	\$0.076
Year 18	\$0.076
Year 19	\$0.076
Year 20	\$0.076
Year 21	\$0.076
Year 22	\$0.076
Year 23	\$0.076
Year 24	\$0.076
Year 25	\$0.076

- 2. **Exclusions.** The Guaranty set forth in Section 1 does not apply to the extent of any reduced generation from the Solar Power Facility due to the following (including the downtime required for repair, replacement or correction):
  - A. Force Majeure (as defined in the Agreement) and (i) a power or voltage surge caused by someone other than Power Provider, including a grid supply voltage outside of the standard range specified by the Utility; and (ii) theft of the Solar Power Facility.
  - B. Purchaser's material breach of its obligations under the Agreement.
- 3. <u>Liquidated Damages</u>; <u>Waiver of Cost Savings</u>. The Parties agree that the payment described in Section 1(B) is a reasonable approximation of the damages suffered by Purchaser as a result of underperformance of the Solar Power Facility.

## **Schedule 4**

## **Certificate of Acknowledgement**

PURCHASER: North Kern Water Storage District
SOLAR SERVICES AGREEMENT: The Solar Services Agreement made and entered into as of
THE UNDERSIGNED ACKNOWLEDGES THAT:
1. All terms capitalized but not otherwise defined herein have the meaning assigned to them in the Solar Services Agreement.
2. The equipment and products described in the above-referenced Solar Services Agreement have achieved Commercial Operation beginning on the Acknowledgement Date noted below.
3. The undersigned will commence payment in accordance with the provisions of the Solar Services Agreement beginning on the Acknowledgement Date noted below.
Acknowledgement Date:
Authorized Signature:
Authorized Signature.
Name Typed or Printed:
TOTAL

#### Schedule 5

#### **Certain Agreements for the Benefit of Lenders**

Purchaser acknowledges that Power Provider will be receiving financing accommodations from one or more Lenders and that, to the extent permitted by the terms of this Agreement, Power Provider may sell or assign the Solar Power Facility or this Agreement and/or may secure Power Provider's obligations by, among other collateral, a pledge or collateral assignment of this Agreement and a first security interest in the Solar Power Facility (any such agreement, a "Financing Agreement"). In order to facilitate such necessary sale, conveyance, or financing, and with respect to any such Lender, Purchaser agrees as follows:

- (a) <u>Consent to Collateral Assignment</u>. To the extent consistent with the terms of this Agreement, the Purchaser consents to either the assignment, sale or conveyance to a Lender or the collateral assignment by Power Provider to a Lender, of Power Provider's right, title and interest in and to this Agreement.
- (b) <u>Notices of Default</u>. Purchaser will deliver to any Lender, concurrently with delivery thereof to Power Provider, a copy of each notice of default given by Purchaser under this Agreement, inclusive of a reasonable description of the Power Provider default. No such notice will be effective absent delivery to any Lender, provided that the Lender or Power Provider has provided prior written notice to Purchaser that Lender has entered into a Financing Agreement with Power Provider.
- (c) <u>Rights Upon Event of Default</u>. Except as otherwise provided in this Agreement:
- i. Any Lender shall be entitled to exercise, in the place and stead of Power Provider, any and all rights and remedies of Power Provider under this Agreement in accordance with the terms of this Agreement and only in the event of Power Provider's or Purchaser's default. Lenders shall also be entitled to exercise all rights and remedies of secured parties generally with respect to this Agreement and the Solar Power Facility.
- ii. Any Lender shall have the right, but not the obligation, to pay all sums due under this Agreement and to perform any other act, duty or obligation required of Power Provider thereunder or cause to be cured any default of Power Provider thereunder in the time and manner provided by the terms of this Agreement. Nothing herein requires a Lender to cure any default of Power Provider under this Agreement or (unless said Lender has succeeded to Power Provider's interests under this Agreement) to perform any act, duty or obligation of Power Provider under this Agreement, but Purchaser hereby grants Lenders the option to do so.
- iii. Upon the exercise of remedies under its security interest in the Solar Power Facility, including any sale thereof by the applicable Lender, whether by judicial proceeding or under any power of sale contained therein, or any conveyance from Power Provider to said Lender (or any assignee of said Lender) in lieu thereof, said Lender shall give notice to Purchaser of the transferee or assignee of this Agreement. Any such exercise of remedies shall not constitute a default under this Agreement.

#### (d) <u>Right to Cure</u>.

i. Purchaser will not exercise any right to terminate or suspend this Agreement unless it shall have given any Lender prior written notice by sending notice to such Lender(s) (at the address provided by Power Provider) of its intent to terminate or suspend this Agreement, specifying the condition giving rise to such right, and said Lender shall not have caused to be cured the condition giving rise to the right of termination or suspension within thirty (30) days after such notice or (if longer) the periods provided for in this Agreement. The Parties agree that the cure rights described herein are in addition to and apply and commence following the expiration of any notice and cure period applicable to the Power Provider. The

Parties respective obligations will otherwise remain in effect during any cure period; <u>provided</u> that if such Power Provider default reasonably cannot be cured by said Lender within such period and said Lender commences and continuously pursues cure of such default within such period, such period for cure will be extended for a reasonable period of time under the circumstances, such period not to exceed additional ninety (90) days.

- ii. If a Lender (including any purchaser or transferee), pursuant to an exercise of remedies by said Lender, shall acquire title to or control of Power Provider's assets and shall, within the time periods described in subsection (d)(i) above, cure all defaults under this Agreement existing as of the date of such change in title or control in the manner required by this Agreement and which are capable of cure and are timely cured by a third person or entity, then such person or entity shall no longer be in default under this Agreement, and this Agreement shall continue in full force and effect.
- Release and Waiver; Financing Agreement Defaults. Until such time as all of Power Provider's obligations to any Lender under a Financing Agreement (excluding contingent indemnification and reimbursement obligations that, by their express terms, survive the repayment of the loans, interest, fees and other amounts owed under said Financing Agreement) have been paid in full, except as otherwise provided in this Agreement, Purchaser hereby waives, releases and relinquishes to said Lender all right, title, interest, claim and lien which Purchaser has or may in the future have, under any and all applicable laws, including statutory rights, in, to or against the Solar Power Facility and the Solar Power Facility shall not be subject to levy, sale on distress or distraint for rent or any claim, lien or demand of any kind by Purchaser. If an event of default occurs and is continuing under a Financing Agreement, Purchaser agrees that the affected Lender has the right to (i) enter the Property to remove or dispose of the Solar Power Facility at any time; (ii) take possession of and succeed to all of Power Provider's right, title and interest under this Agreement, including the right to operate the Solar Power Facility provided the operator meets the requirements of a Qualified Assignee, and/or (iii) prepare the Solar Power Facility for sale and/or conduct a sale or liquidation of the Solar Power Facility on the Property and/or store the Solar Power Facility on the Property for a reasonable period in connection therewith. The Lender shall not be liable for rental storage charges under the Agreement or otherwise; provided, however, that said Lender agrees to remove or abandon the Solar Power Facility in accordance with the requirements of this Agreement. Nothing herein or elsewhere shall be deemed to prevent or limit a Lender, at its option, from abandoning the Solar Power Facility. Purchaser agrees that any action taken by a Lender to exercise its remedies under a Financing Agreement shall not constitute a default or event of default under this Agreement, and this Agreement shall continue in full force and effect following the exercise of such remedies.

#### Schedule 6

#### **Insurance Requirements of Power Provider**

Coverage and Additional Insured Status. At all times during the Contract Term, Power Provider shall maintain or ensure the following is maintained (a) property insurance on the Solar Power Facility for the replacement cost thereof, (b) commercial general liability insurance with coverage of at least \$1,000,000 per occurrence and \$2,000,000 annual aggregate, (c) employer's liability insurance with coverage of at least \$1,000,000 and (iv) workers' compensation insurance as required by law. Power Provider's coverage may be provided as part of an enterprise insurance program. The commercial general liability insurance shall by endorsement to the policy or policies, include the Purchaser and officers, directors, employees and agents as additional insureds.

<u>Policy Provisions</u>. Power Provider's insurance policy shall (i) contain a provision whereby the insurer agrees to give the other Party at least thirty (30) days (ten (10) days for non-payment of premiums) written notice before the insurance is cancelled, or terminated, (ii) be written on an occurrence basis, and (iii) be maintained with companies either rated no less than A-VII as to Policy Holder's Rating in the current edition of A.M. Best's Insurance Guide or otherwise reasonably acceptable to the other Party.

<u>Certificates</u>. Power Provider shall deliver to Purchaser certificates of insurance evidencing the above required coverage and the required additional insured endorsements.

**<u>Deductibles</u>**. Power Provider shall pay its own insurance deductibles.

## **Schedule 7**

## **Electronic Sample Form No. 79-1191**

Generating Facility Interconnection Agreement for Local Government Renewable Energy Self-Generation Bill Credit Transfer (RES-BCT)



Schedule 8
[Legal Description]



#### Exhibit A

### of General Conditions

#### FORM OF MEMORANDUM OF LICENSE

THIS MEMORANDUM OF LICENSE AGREEMENT ("Memorandum") is made and entered into on [] by and between [INSERT LEGAL NAME, ENTITY TYPE AND STATE OF FORMATION] ("Licensor"), and [Project Company, LLC, a Delaware limited liability company] ("Licensee"), for the Term (as hereinafter defined), to certain real
property which is described particularly on the attached Property ("Property") in Exhibit 1, attached hereto.
WHEREAS, Licensor and Licensee have entered into a Solar Power and Services Agreement dated as of [] for purchase and sale of electrical energy (the "Solar Agreement"), such Solar Agreement includes the grant of license to Provider for the Property, pursuant to the terms of the Solar Agreement. The terms of the license include, but are not limited to, all the rights necessary for Licensee to use and occupy portions of the Property for the installation, operation, maintenance and removal of the Solar Power Facility pursuant to the terms of the Solar Agreement
WHEREAS, Licensor and Licensee (collectively, "Parties") enter into this Memorandum to set forth certain terms and conditions and to provide constructive notice of the license pursuant to the terms of the Solar Agreement.
NOW, THEREFORE, in consideration of the foregoing, the Parties hereby agree as follows:
1. The Licensor hereby grants license to the Property to the Licensee, and the Licensee hereby has license to the Property from the Licensor.
2. The Term of the license commenced on [] and will terminate on [], or the end of the term of the Solar Services Agreement between Licensor and Licensee or other mutually agreed upon term, whichever is later.
All of the license provisions set forth in the Solar Agreement are incorporated in this Memorandum by

5. The Solar Agreement and this Memorandum shall be binding upon and inure to the benefit of the Parties and their respective heirs, executors, administrators, successors and assigns, and shall be construed as covenants running with the land.

legal and beneficial owner of the Solar Power Facility and (b) the Solar Power Facility shall at all times be personal property of Licensee, as defined under Article 9 of the Uniform Commercial Code, and shall not be deemed attached to, a

Licensor and Licensee agree and acknowledge that (a) Licensee shall at all times retain title to and be the

reference.

fixture of or to, or an accession or part of, the Property.

6. In the event of any conflict between this Memorandum and the Solar Agreement, the Solar Agreement shall control.

## **Exhibit 1 to Memorandum of License**

[Description of Premises]



IN WITNESS WHEREOF, this A, 20	greement has been executed and delivered under seal on this	day of
Provider:		
By:		
Print Name:		
Title:		
Purchaser:		<b>&gt;</b>
By:		
Print Name:		
Title:		

[FOR FORM PURPOSES ONLY – DO NOT EXECUTE]

STATE OF	)	
	SS.	
COUNTY C	OF)	
On	before me,	, Notary Public, personally appeared
to the within	n instrument and acknowledged to	, Notary Public, personally appeared the basis of satisfactory evidence to be the person whose name is subscribed me that he/she executed the same in his/her authorized capacity, and that by or the entity upon behalf of which the person acted, executed the instrument.
certify und	ler PENALTY OF PERJURY und	er the laws of the State of [] that the foregoing paragraph is true and
WIINESS r	my hand and official seal.	
	/FOR FORM	PURPOSES ONLY – DO NOT EXECUTEI