

FINDING OF NO SIGNIFICANT IMPACT

Accelerated Water Transfer and Exchange Program for Friant Division and Cross Valley Contractors - Contract Years 2016-2020

**FONSI-15-018** 



# **Mission Statements**

The mission of the Department of the Interior is to protect and manage the Nation's natural resources and cultural heritage; provide scientific and other information about those resources; and honor its trust responsibilities or special commitments to American Indians, Alaska Natives, and affiliated island communities.

The mission of the Bureau of Reclamation is to manage, develop, and protect water and related resources in an environmentally and economically sound manner in the interest of the American public.

# BUREAU OF RECLAMATION South-Central California Area Office, Fresno, California

FONSI-15-018

# Accelerated Water Transfer and Exchange Program for Friant Division and Cross Valley Contractors - Contract Years 2016-2020

Kelly Bake	1/13/16
Prepared by: Kerly Baker	Date
Natural Resources Specialist	
Shaura MEDanald	1/13/16
Concurred by: Shauna McDonald	Date
Wildlife Biologist	
	/ /
M. Enun	Date 13/2016
Concurred by: Rain L. Emerson	Date
Supervisory Natural Resources Specialist	
Winhoel P. Jakson	1/18/2016
Approved by: Michael Jackson, P.E.	Date
Area Manager	

# Introduction

In accordance with section 102(2)(c) of the National Environmental Policy Act of 1969, as amended, the South-Central California Area Office of the Bureau of Reclamation (Reclamation), has determined that the continuation of annual water transfers or exchanges historically carried out by previous acceleration programs is not a major federal action that will significantly affect the quality of the human environment and an environmental impact statement is not required. This Finding of No Significant Impact (FONSI) is supported by Reclamation's Environmental Assessment (EA) Number EA-15-018, Accelerated Water Transfer and Exchange Program for Friant Division and Cross Valley Contractors – Contract Years 2016-2020, and is hereby incorporated by reference.

Reclamation provided the public with an opportunity to comment on the Draft FONSI and Draft EA between December 14, 2015 and January 12, 2016. No comments were received.

# **Background**

The Central Valley Project Improvement Act (CVPIA, Title 34 of Public Law 102-575) was signed into law in 1992 to mandate changes in management of the Central Valley Project (CVP). In addition to protecting, restoring, and enhancing fish and wildlife, one of the other purposes of the CVPIA is to increase water-related benefits provided by the CVP to the State of California through expanded use of voluntary water transfers and improved water conservation. To assist California urban areas, agricultural water users, and others in meeting their future water needs, Section 3405(a) of the CVPIA authorizes all individuals or districts who receive CVP water under water service or repayment contracts, water rights settlement contracts or exchange contracts, to transfer (subject to certain terms and conditions) all or a portion of the water subject to such contract to any other California water users or water agency, State or Federal agency, Indian Tribe, or private non-profit organization for project purposes or any purpose recognized as beneficial under applicable State law.

After enactment of the CVPIA, Reclamation has historically acknowledged water transfers and/or exchanges between CVP contractors geographically situated within the same region and who are providing water service through the same CVP facilities under an accelerated water transfer program (AWTP).

# **Proposed Action**

Reclamation proposes to implement an accelerated process for annual water transfers and/or exchanges pursuant to Section 3405(a) of the CVPIA for Contract Years 2016 through 2020 (March 1, 2016 to February 28, 2021) as described in Section 2.2 in EA-15-018. The cumulative amount of water transferred or exchanged annually would be limited to 255,000 acre-feet (AF). Prior to acknowledgement, each proposed transfer or exchange would be reviewed by the

Contracting Officer for consistency with the project description in EA-15-018 and all applicable permits, laws, and regulations. Additional administrative and environmental reviews would be required if a proposed transfer and/or exchange is inconsistent with the project description in EA-15-018.

## **Findings**

Reclamation's finding that implementation of the Proposed Action will result in no significant impact to the quality of the human environment is supported by the following findings:

#### **Resources Eliminated from Detailed Analysis**

As described in Table 3 of EA-15-018, Reclamation analyzed the affected environment and determined that the Proposed Action does not have the potential to cause direct, indirect, or cumulative adverse effects to the following resources: air quality, cultural resources, environmental justice, global climate, Indian Sacred Sites, Indian Trust Assets, land use, or socioeconomics.

#### **Water Resources**

The Proposed Action would not increase or decrease the amount of CVP water each district receives under contract with Reclamation. Transfers would help supplement any surface water shortage that a particular water district, or districts, could be experiencing at that current time. Exchanges under the AWTP would be "bucket-for-bucket". There would be no adverse impacts to participating districts and their respective Friant Division CVP water supplies.

Due to variations in weather and hydrological conditions, agricultural water needs are time sensitive, and usually arise on short-notice. The AWTP would allow Friant Division and Cross Valley CVP contractors to efficiently shift CVP water supplies from areas of low demand (at the time of approval) to areas of greater demand. The Proposed Action would help alleviate the need of some landowners to pump groundwater since surface water supplies would be more available to districts in need of supplemental supplies. There would be beneficial impacts to groundwater resources.

The AWTP requires that the CVP contractor provide Reclamation with advance notice of any proposed transfer and/or exchange so that Reclamation could determine if the action is consistent with the Proposed Action description and coordinate with the Friant Water Authority to make sure that excess capacity exists within Friant Division facilities. In addition, coordination would ensure that Reclamation's obligations to deliver water to other CVP contractors, wildlife refuges, and other requirements would not be adversely impacted by the Proposed Action. There would be no adverse impacts to Friant Division facilities.

#### **Biological Resources**

The Proposed Action would not alter CVP operations, water storage or release patterns from CVP facilities, or the maximum volume of water delivered to the Contractors as compared to the No Action Alternative. The transfers and exchanges are water management actions to support existing uses and conditions. No native lands would be cultivated as a result of the Proposed Action. Lands fallowed and untilled for three or more years would require surveys for wildlife

species including threatened and endangered species prior to application of this water. Subsequent environmental review and consultations, if applicable, would be required to irrigate lands fallowed and untilled three or more years.

Therefore, biological resource conditions under the Proposed Action would be identical to those under the No Action Alternative and the Proposed Action Alternative would have no effect on federally listed species, critical habitat, or candidate species. Diversions from Millerton Lake would not change. The Proposed Action would not interfere with other management decisions for the Friant Division facilities.

#### **Cumulative Impacts**

Cumulative impacts result from incremental impacts of the Proposed Action when added to other past, present, and reasonably foreseeable future actions. Cumulative impacts can result from individually minor but collectively significant actions taking place over a period of time. Significance exists if it is reasonable to anticipate a cumulatively significant impact on the environment. The incremental effect of the Proposed Action was examined with impacts from past, present, and reasonably foreseeable future actions in the same geographic area in order to determine whether cumulatively significant impacts could occur.

#### Water Resources

The Proposed Action would not result in impacts to CVP water supplies, operations, or facilities when considered in combination with past, present, and future projects as the supplies would not increase diversions and would come from willing sellers' allocations; therefore there would be no cumulative impacts to these resources. Water acquisition under an accelerated program in conjunction with past, present, and future individual water acquisition actions could have a beneficial cumulative impact on refuges due to increased water supply reliability especially during critical operational time periods.

#### **Biological Resources**

Cumulatively this action would have no effect on biological resources the project area. Transfers and exchanges under the Proposed Action would not result in cumulative impacts to biological resources.



**Final Environmental Assessment** 

Accelerated Water Transfer and Exchange Program for Friant Division and Cross Valley Contractors - Contract Years 2016-2020

EA-15-018



# **Mission Statements**

The mission of the Department of the Interior is to protect and manage the Nation's natural resources and cultural heritage; provide scientific and other information about those resources; and honor its trust responsibilities or special commitments to American Indians, Alaska Natives, and affiliated island communities.

The mission of the Bureau of Reclamation is to manage, develop, and protect water and related resources in an environmentally and economically sound manner in the interest of the American public.

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# **Section 1 Introduction**

The Bureau of Reclamation (Reclamation) provided the public with an opportunity to comment on the Draft Finding of No Significant Impact (FONSI) and Draft Environmental Assessment (EA) between December 14, 2015 and January 12, 2016. No comments were received. Changes between this Final EA and the Draft EA, which are not minor editorial changes, are indicated by vertical lines in the left margin of this document.

#### 1.1 Background

The Central Valley Project Improvement Act (CVPIA, Title 34 of Public Law 102-575) was signed into law in 1992 to mandate changes in management of the Central Valley Project (CVP). In addition to protecting, restoring, and enhancing fish and wildlife, one of the other purposes of the CVPIA is to increase water-related benefits provided by the CVP to the State of California through expanded use of voluntary water transfers and improved water conservation. To assist California urban areas, agricultural water users, and others in meeting their future water needs, Section 3405(a) of the CVPIA authorizes all individuals or districts who receive CVP water under water service or repayment contracts, water rights settlement contracts or exchange contracts, to transfer (subject to certain terms and conditions) all or a portion of the water subject to such contract to any other California water users or water agency, State or Federal agency, Indian Tribe, or private non-profit organization for project purposes or any purpose recognized as beneficial under applicable State law.

After enactment of the CVPIA, Reclamation has historically acknowledged water transfers and/or exchanges between CVP contractors geographically situated within the same region and who are providing water service through the same CVP facilities under an accelerated water transfer program (AWTP). The most recent AWTP for Friant Division CVP contractors was analyzed in an Environmental Assessment (EA) entitled *Accelerated Water Transfer Program for Friant Division and Cross Valley Central Valley Project Contractors*, 2011-2015 (EA-10-052). EA-10-052 analyzed the continued implementation of a five-year AWTP (March 1, 2011 through February 29, 2016) between Friant Division and Cross Valley CVP contractors (see Figure 1). A Finding of No Significant Impact (FONSI) was signed on February 11, 2011. FONSI/EA-10-052 is hereby incorporated by reference.

#### 1.2 Need for the Proposed Action

The current AWTP for Friant Division and Cross Valley CVP contractors is set to expire February 29, 2016. A new AWTP is needed in order to continue facilitation of efficient and timely water management practices by allowing contractors within the same geographical areas to conduct annual transfers or exchanges of the type historically carried out under previous accelerated programs. Due to variations in weather and hydrological conditions, agricultural water needs are time sensitive, and usually arise on short-notice.

The purpose of the AWTP is to continue facilitating efficient and timely water management practices between Friant Division and Cross Valley CVP contractors through annual water transfers and/or exchanges in order to meet agricultural demands and/or municipal and industrial (M&I) or other water requirements. In addition, the AWTP would reduce costs and redundant environmental reviews associated with CVP water transfers and/or exchanges, thereby streamlining Reclamation's approval process.

#### 1.3 Related Environmental Documents

The U.S. Fish and Wildlife Service (Service) and the National Marines Fisheries Service (NMFS) issued Biological Opinions, which provide Reclamation with guidelines for operation of the CVP and for renewal of certain CVP contracts.

- Biological Opinion on U.S. Bureau of Reclamation Long Term Contract Renewal of Friant Division and Cross Valley Unit Contracts (Service 2001)
- Biological Opinion on the Coordinated Operations of the Central Valley Project and State Water Project (Service 2008)
- Biological Opinion and Conference Opinion on the Long-Term Operations of the Central Valley Project and State Water Project (NMFS 2009)

To be exempt from the "take" prohibition of the Endangered Species Act (ESA), Reclamation must comply with terms and conditions which are pertinent to future water transfers and/or exchanges within the CVP. These Terms and Conditions implement reasonable and prudent measures and outline mandatory reporting and monitoring. Reasonable and prudent measures are actions that the Service and NMFS believe are necessary to minimize impacts, i.e., amount of or extent, of incidental take and adverse modification or destruction of designated critical habitat. The Terms and Conditions of any applicable Biological Opinion are hereby incorporated by reference.

# 1.4 Authorities and Guidelines for the Accelerated Water Transfer Program

All water transfers are subject to the following authorities and guidelines as amended, updated and/or superseded:

- Title XXXIV CVPIA October 30, 1992, Section 3405(a)
- Reclamation Reform Act, October 12, 1982, Section 226
- Long-term Renewal Water Service Contracts for Friant Division CVP contractors
- Long-term 9(d) Repayment Contracts for Friant Division CVP contractors
- Interim Renewal Water Service Contracts for Cross Valley Contractors
- Long-term Water Service Contracts replacing the interim contracts for Cross Valley Contractors if approved during the term of this EA

- Department of the Interior Final CVPIA Administrative Proposal on Water Transfers, April 16, 1998
- Reclamation and Service Region 1, Final Administrative Proposal on Water Transfers April 16, 1998
- Reclamation's Regional Director's Letter Delegation of Regional Functional Responsibilities to the Area Offices Water Transfers, Number 08-01 March 17, 2000

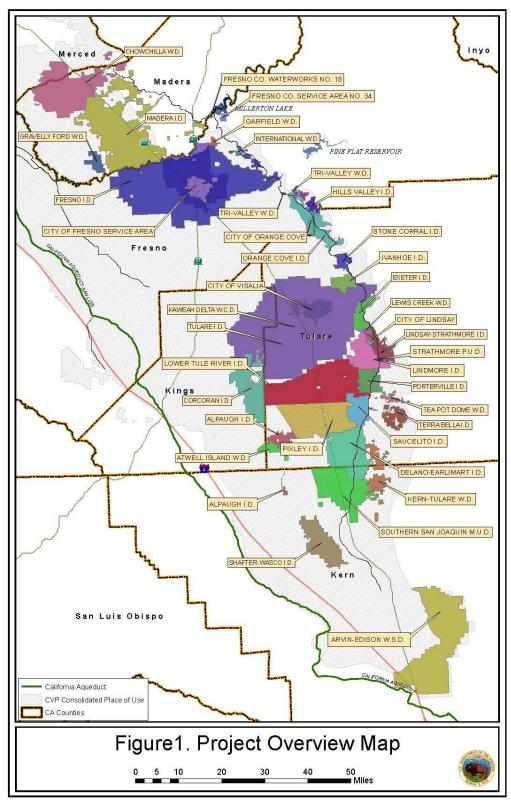


Figure 1 Friant Division and Cross Valley CVP Contractors. Does not include Counties and all Fresno Service Areas (see Table 1).

# Section 2 Alternatives Including the Proposed Action

This EA considers two possible actions: the No Action Alternative and the Proposed Action. The No Action Alternative reflects future conditions without the Proposed Action and serves as a basis of comparison for determining potential effects to the human environment.

## 2.1 No Action Alternative

Under the No Action Alternative, Reclamation would not approve an accelerated water transfer and exchange program for Friant Division and Cross Valley CVP contractors. CVP contractors would need to seek individual approval from Reclamation for temporary one-year transfers and/or exchanges. Each action would require separate environmental review and approval from Reclamation.

#### 2.2 Proposed Action

Reclamation proposes to implement an accelerated process for annual water transfers and/or exchanges pursuant to Section 3405(a) of the CVPIA for Contract Years 2016 through 2020 (March 1, 2016 to February 28, 2021).

Eligible participants in the AWTP are listed in Table 1. The Proposed Action would cover transfers and/or exchanges between Friant Division contractors and transfers from Friant Division contractors to Cross Valley Contractors. Friant Division CVP contractors (for the purposes of water transfers only) are deemed to meet the criteria of Section 3405(a)(l)(M) of the CVPIA, therefore, are not required to limit their transfers to the cap of the in-district deliveries in three normal years prior to the CVPIA or meeting the consumptive use criteria. This determination does not address any other issues related to the Friant Division and the area of origin statues, and is subject to change if relevant state law were modified. The Cross Valley Contractors' CVP supplies from the Sacramento-San Joaquin River Delta (Delta) do not meet the criteria of this section of CVPIA; therefore, their Delta CVP supplies are not included in the Proposed Action. As a result, Cross Valley Contractors could only be on the receiving end of transfers from Friant Division contractors and not involved in exchanges since their supplies from the Delta are not covered under this AWTP.

In addition, federal wildlife refuges within the same geographical area (see Figure 2) have also participated in previous AWTPs as recipients of transfers and would continue to do so under the Proposed Action. Reclamation conducts a separate water acquisition program for wildlife refuges pursuant to Section 3406(d)(2) of the CVPIA that undergoes separate environmental analysis and approval and is not part of this Proposed Action.

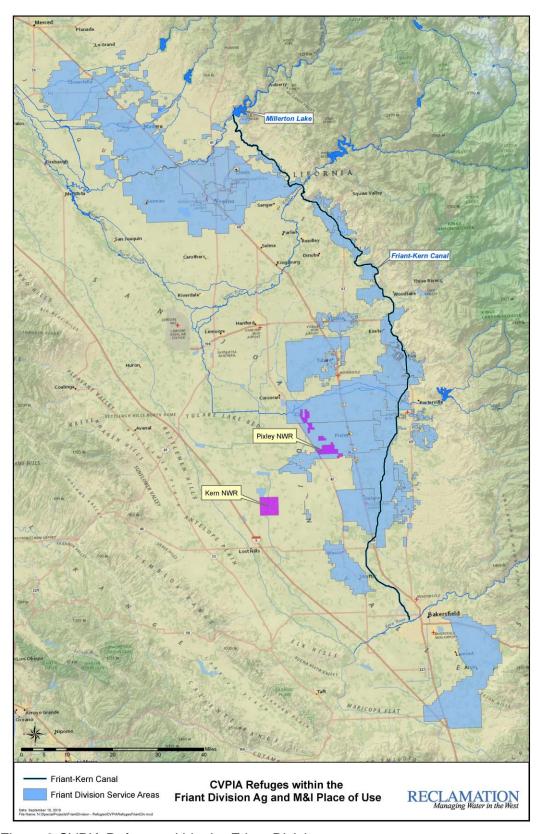


Figure 2 CVPIA Refuges within the Friant Division

The Proposed Action would utilize existing Friant Division facilities including Millerton Lake, Friant Dam, Madera Canal, and the Friant-Kern Canal. No ground disturbance, construction, or modification of facilities would be allowed for delivery of CVP water under the Proposed Action.

The Proposed Action would allow Reclamation to acknowledge the proposed transfers or exchanges without any additional environmental analysis. The cumulative amount of water transferred or exchanged annually would be limited to 255,000 acre-feet (AF). Prior to acknowledgement, each proposed transfer or exchange would be reviewed by the Contracting Officer for consistency with the project description within this EA and all applicable permits, laws, and regulations. Additional administrative and environmental reviews would be required if a proposed transfer and/or exchange is inconsistent with the project description in this EA.

Table 1 Friant Division and Cross Valley Contractors

Friant Division Contractors				
Arvin-Edison Water Storage District Chowchilla Water District				
City of Fresno	City of Lindsay			
City of Orange Cove	County of Madera			
Delano-Earlimart Irrigation District	Exeter Irrigation District			
Fresno County Waterworks No. 18	Fresno Irrigation District			
Garfield Irrigation District	Gravelly Ford Water District			
Hills Valley Irrigation District	International Water District			
Ivanhoe Irrigation District	Kaweah Delta Water Conservation District <sup>1</sup>			
Kern-Tulare Water District	Lewis Creek Water District			
Lindmore Irrigation District	Lindsay-Strathmore Irrigation District			
Lower Tule River Irrigation District Madera Irrigation District				
Orange Cove Irrigation District Porterville Irrigation District				
Saucelito Irrigation District	Shafter-Wasco Irrigation District			
Southern San Joaquin Municipal Utility District	Stone Corral Irrigation District			
Tea Pot Dome Water District Terra Bella Irrigation District				
Tri-Valley Water District	Tulare Irrigation District			
<sup>1</sup> Kaweah Delta Water Conservation District is comprised				
Kings County Water District, Corcoran Irrigation District,	and Tulare Irrigation District.			
Cross Valley Contractors				
County of Fresno <sup>1</sup>	County of Tulare <sup>2</sup>			
Kern-Tulare Water District (previously combined with	Lower Tule River Irrigation District			
Rag Gulch Water District)	-			
Pixley Irrigation District	Tri-Valley water District			
Hills Valley Irrigation District				
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<sup>&</sup>lt;sup>1</sup>Including its subcontractors: Fresno County Service Areas #5, #10, and #14 and Fresno County Water Works #34.

Friant Division CVP contractors would annually transfer or exchange up to 255,000 AF of their CVP contract supply each year subject to the following conditions:

- Transfers or exchanges that are greater than 20 percent of a contractor's supply must be
  publically noticed by the contractor prior to Reclamation's acknowledgment of such
  transfer or exchange.
- There is no restriction on directionality within the AWTP (transfers do not require returns at a later date or year).

<sup>&</sup>lt;sup>2</sup>Including its subcontractors: Alpaugh Irrigation District, Atwell Island Water District, City of Lindsay, Smallwood Vineyards, Hills Valley Irrigation District, Saucelito Irrigation District, Stone Corral Irrigation District, Strathmore Public Utilities District, Styrotek, Inc., and City of Visalia.

- Transferred or exchanged water can be agricultural, M&I, or other water.
- Transferred or exchanged water can be used for agricultural, M&I, other purposes, or for groundwater recharge.
- Transfers or exchanges would be completed within the same Contract Year (March 1st to February 28/29 of the following year).
- All transfers and exchanges will be between willing sellers and willing buyers.
- Exchanges would only count once towards the up to 255,000 AF annual limit since exchanges would be 1:1, or those of equivalent amounts where neither district experiences a net gain or loss.
- Transfers or exchanges must occur within the permitted CVP Consolidated Place-of-use.
- Transfers or exchanges are limited to existing supply and will not increase overall consumptive use.
- Transfers or exchanges for agriculture would be used on lands irrigated within the last three consecutive years.
- Transfers or exchanges would not lead to any land conversions.
- No native land or untilled land (fallow for three consecutive years or more) would be cultivated with the water involved in these actions.
- Transfers or exchanges would comply with all Federal, State, Local or Tribal laws or requirements imposed for the protection of the environment and Indian Trust Assets.
- The Transferee would comply with Reclamation Reform Act, as applicable.
- Water for transfer or exchange may not be made available by shifting to an alternative surface water source that could potentially adversely affect CVP operations or other third party interests.
- Transfers or exchanges cannot alter the flow regime of natural water bodies such as rivers, streams, creeks, ponds, pools, wetlands etc., so as to not have a detrimental effect on fish, wildlife, or their habitats.

#### This Proposed Action does not cover:

- Transfers or exchanges that meet the above criteria but are increments of larger actions.
- Unbalanced exchanges.
- Transfers or exchanges of Cross Valley Delta CVP water supplies.
- Transfers or exchanges that involve previously transferred or exchanged water.
- Transfers or exchanges that involve a third party intermediary as an exchanger or transferor.
- Transfers or exchanges of Section 215 water.
- Transfers or exchanges to non-CVP contractors.

# **Section 3 Affected Environment and Environmental Consequences**

This section identifies the potentially affected environment and the environmental consequences involved with the Proposed Action and the No Action Alternative, in addition to environmental trends and conditions that currently exist.

# 3.1 Resources Eliminated from Further Analysis

Reclamation analyzed the affected environment and determined that the Proposed Action did not have the potential to cause direct, indirect, or cumulative adverse effects to the resources listed in Table 2.

Table 2 Resources Eliminated from Further Analysis

Resource	Reason Eliminated
Air Quality	The Proposed Action would not require construction or modification of facilities to move water between the districts. Transferred water would move via gravity which would not produce emissions that impact air quality. No impacts to air quality would occur and a determination of general conformity under the Clean Air Act is not required.
Cultural Resources	The Proposed Action would facilitate the flow of water through existing facilities to existing users. As no construction or modification of facilities would be needed in order to complete the Proposed Action, Reclamation has determined that these activities have no potential to cause effects to historic properties pursuant to 36 CFR Part 800.3(a)(1). See Appendix A for Reclamation's determination.
Environmental Justice	The Proposed Action would not cause dislocation, changes in employment, or increase flood, drought, or disease nor would it disproportionately impact economically disadvantaged or minority populations.
Global Climate	The Proposed Action would not result in emissions of greenhouse gases as water would move in existing facilities via gravity. Global climate change is expected to have some effect on the snow pack of the Sierra Nevada and the runoff regime. Current data are not yet clear on the hydrologic changes and how they will affect the San Joaquin Valley. CVP water allocations are made dependent on hydrologic conditions and environmental requirements. Since Reclamation operations are flexible, any changes in hydrologic conditions due to global climate change would be addressed within Reclamation's operation flexibility.
Indian Sacred Sites	The Proposed Action would not limit access to or ceremonial use of Indian sacred sites on Federal lands by Indian religious practitioners or significantly adversely affect the physical integrity of such sacred sites.
Indian Trust Assets	The Proposed Action would not impact Indian Trust Assets as there are none in the Proposed Action area.
Land Use	The Proposed Action would not change historic land and water management practices. Exchanged water would move through existing facilities for delivery to lands within Fresno, Merced, Madera, Tulare, Kings, and Kern counties. The water would not be used to place untilled or new lands into production, or to convert undeveloped land to other uses.
Socioeconomics	The Proposed Action would have beneficial impacts on socioeconomic resources within the Friant Division and Cross Valley Contractors' service areas as water would be used to help sustain existing crops and maintain farming.

#### 3.2 Water Resources

#### 3.2.1 Affected Environment

The affected environment is the same as described in Section 3.1 of EA-10-052 (Reclamation 2011) which is incorporated by reference into this EA. Rather than repeating the same information, the affected environment and environmental consequences section in this EA will focus on updates or changes.

#### **Friant Division Contractors**

There are 32 Friant Division CVP contractors located on the eastern side of the San Joaquin Valley in Merced, Madera, Fresno, Tulare, Kings, and Kern Counties (Table 3). CVP water for these contractors comes from Millerton Lake via the Friant-Kern Canal or the Madera Canal. Water conveyed to these contractors is categorized as Friant Class 1 or Class 2 water depending on its reliability and allocation circumstances.

Table 3 Contract Quality of Friant Division Contractors

Contractor	Class 1 (AFY)	Class 2 (AFY)
Arvin-Edison Water Storage District	40,000	311,675
City of Fresno	60,000	0
<sup>2</sup> City of Lindsay	2,500	0
City of Orange Cove	1,400	0
Delano-Earlimart Irrigation District	108,800	74,500
Exeter Irrigation District	11,100	19,000
Fresno Irrigation District	0	75,000
Garfield Water District	3,500	0
Gravelly Ford Water District	0	14,000
<sup>2</sup> Hills Valley Irrigation District	1,250	0
International Water District	1,200	0
Ivanhoe Irrigation District	6,500	500
<sup>1</sup> Kaweah Delta Water Conservation District	1,200	7,400
<sup>2</sup> Kern-Tulare Irrigation District	0	5,000
Lewis Creek Water District	1,200	0
Lindmore Irrigation District	33,000	22,000
Lindsay-Strathmore Irrigation District	27,500	0
<sup>2</sup> Lower Tule River Irrigation District	61,200	238,000
Orange Cove Irrigation District	39,200	0
Porterville Irrigation District	15,000	30,000
<sup>2</sup> Saucelito Irrigation District	21,500	32,800
Shafter-Wasco Irrigation District	50,000	39,600
Southern San Joaquin Municipal Utility District	97,000	45,000
<sup>2</sup> Stone Corral Irrigation District	10,000	0
Tea Pot Dome Water District	7,200	0
Terra Bella Irrigation District	29,000	0
<sup>2</sup> Tri-Valley Water District	400	0

Contractor	Class 1 (AFY)	Class 2 (AFY)
Tulare Irrigation District	30,000	141,000

<sup>1</sup>Kaweah Delta Water Conservation District is comprised of four districts: Lakeside Irrigation Water District, Kings County Water District, Corcoran Irrigation District, and Tulare Irrigation District. <sup>2</sup>Lower Tule River ID, Saucelito ID, Stone Corral ID, Tri-Valley, Kern-Tulare, Hills Valley and City of Lindsay receive CVP water under more than one contract, either as a Friant Division and/or Cross Valley Contractor/Sub-Contractor.

#### **Cross Valley Contractors**

Cross Valley Contractors (Table 4) are CVP contractors that are geographically located within the Friant Division but receive their CVP supplies from the Delta. Due to direct conveyance hurdles, Cross Valley Contractors obtain their CVP supplies either by direct delivery from the Cross Valley Canal or via exchanges for water from Millerton Lake pursuant to Article 5(a) of their water service contracts.

**Table 4 Cross Valley Contractors** 

Contractor	Contract Quantity (AFY)
County of Fresno <sup>1</sup>	3,000
County of Tulare <sup>2</sup>	5,308
Hills Valley Irrigation District <sup>3</sup>	3,346
Kern-Tulare Water District	40,000
Kern-Tulare Water District (from Rag Gulch Water District) <sup>3,4</sup>	13,300
Lower Tule River Irrigation District	31,102
Pixley Irrigation District	31,102
Tri-Valley Water District	1,142

<sup>&</sup>lt;sup>1</sup>County of Fresno includes Fresno County Service Area #34

#### 3.2.2 Environmental Consequences

#### No Action

The No Action Alternative envisions the transfers and exchanges of Friant Division CVP water to continue as has historically occurred between Friant Division and Cross Valley CVP contractors; however, each action would require separate approval and environmental review. Since the request to transfer and/or exchange water is usually driven by time sensitive needs, requires coordination, and could sometimes only be completed within a short window of opportunity, the delay in the approval process could render some of the transfers or exchanges infeasible.

Individual landowners would continue to pump groundwater in order to make up for any potential shortages in surface water supplies, which could contribute to declining groundwater

<sup>&</sup>lt;sup>2</sup>County of Tulare includes the following subcontractors: Alpaugh Irrigation District, Atwell Water District, Hills

Valley Irrigation District, Saucelito Irrigation District<sup>4</sup>, Stone Corral Irrigation District<sup>4</sup>, City of Lindsay<sup>4</sup>, Strathmore Public Utility District, Styrotek, Inc., and City of Visalia

<sup>&</sup>lt;sup>3</sup>Lower Tule River Irrigation District, Saucelito Irrigation District, Stone Corral Irrigation District, Tri-Valley Water District, Kern-Tulare Water District, Hills Valley Irrigation District, and City of Lindsay receive CVP water under more than one contract, either as Friant Division and/or Cross Valley Contractors.

<sup>&</sup>lt;sup>4</sup>Kern-Tulare Water District and Rag Gulch Water District consolidated on January 1, 2009.

levels in both the San Joaquin River and Tulare Lake Hydrologic Regions. Any potential approved transfers or exchanges would need to be coordinated with Reclamation and the Friant Water Authority in order to make sure that there is excess capacity within the conveyance facilities to allow for these actions without impacting Reclamation's obligations to deliver water to other CVP contractors, wildlife refuges, and other requirements. The No Action Alternative would not increase or decrease the amount of CVP water each district receives under contract with Reclamation, respectively. What transfers and/or exchanges that could be approved under the No Action Alternative would help supplement any surface water shortage that a particular water district, or districts, could be experiencing at that current time.

#### **Proposed Action**

Similar to the No Action Alternative, the Proposed Action would not increase or decrease the amount of CVP water each district receives under contract with Reclamation. Transfers would help supplement any surface water shortage that a particular water district, or districts, could be experiencing at that current time. Exchanges under the AWTP would be "bucket-for-bucket". There would be no adverse impacts to participating districts and their respective Friant Division CVP water supplies.

Due to variations in weather and hydrological conditions, agricultural water needs are time sensitive, and usually arise on short-notice. The AWTP would allow Friant Division and Cross Valley CVP contractors to efficiently shift CVP water supplies from areas of low demand (at the time of approval) to areas of greater demand. The Proposed Action would help alleviate the need of some landowners to pump groundwater since surface water supplies would be more available to districts in need of supplemental supplies. There would be beneficial impacts to groundwater resources.

The AWTP requires that the CVP contractor provide Reclamation with advance notice of any proposed transfer and/or exchange so that Reclamation could determine if the action is consistent with the Proposed Action description and coordinate with the Friant Water Authority to make sure that excess capacity exists within Friant Division facilities. In addition, coordination would ensure that Reclamation's obligations to deliver water to other CVP contractors, wildlife refuges, and other requirements would not be adversely impacted by the Proposed Action. There would be no adverse impacts to Friant Division facilities.

#### **Cumulative Impacts**

Neither the No Action or Proposed Action alternatives would result in impacts to CVP water supplies, operations, or facilities when considered in combination with past, present, and future projects as the supplies would not increase diversions and would come from willing sellers' allocations; therefore, there would be no cumulative impacts to these resources. Water acquisition under an accelerated program in conjunction with past, present, and future individual water acquisition actions could have a beneficial cumulative impact on refuges due to increased water supply reliability especially during critical operational time periods.

## 3.3 Biological Resources

#### 3.3.1 Affected Environment

When the CVP began operations, over 30 percent of all natural habitats in the Central Valley and surrounding foothills had been converted to urban and agricultural land use (Reclamation 1999). Prior to widespread agriculture, land within the Proposed Action Area provided habitat for a variety of plants and animals. With the advent of irrigated agriculture and urban development over the last 100 years, many species have become threatened and endangered because of habitat loss. Of the approximately 5.6 million acres of valley grasslands and San Joaquin saltbrush scrub, the primary natural habitats across the valley, less than 10 percent remains today. Much of the remaining habitat consists of isolated fragments supporting small, highly vulnerable populations (Reclamation 1999).

Reclamation obtained a species list from the Service at: http://ecos.fws.gov/ipac/ on September 28, 2015. The list is for Madera, Kings, Kern, and Tulare Counties. Reclamation further queried the California Natural Diversity Database (CNDDB) for additional data (CNDDB 2015). This information, in addition to other information within Reclamation's files, was compiled into Table 5.

Critical habitat occurs in the Proposed Action Area for the following species: Buena Vista Lake shrew, California Condor, California tiger salamander, Greene's tuctoria, hairy Orcutt grass, Hoover's spurge, San Joaquin Valley Orcutt grass, succulent owl's-clover, vernal pool fairy shrimp, and vernal pool tadpole shrimp.

Table 5 Federally Listed Species, Candidate Species and Critical Habitat

Species	Scientific Name	Status	ESA det.	Effects
Bakersfield cactus	Opuntia treleasei	E	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Buena Vista Lake shrew	Sorex ornatus relictus	E, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Blunt-nosed leopard lizard	Gambelia sila	E	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
California Clapper Rail	Rallus longirostris obsoletus	Е	NE	Species' range is outside of the Proposed Action Area.
California Condor	Gymnogyps californianus	E, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
California jewelflower	Caulanthus californicus	Е	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.

Species	Scientific Name	Status	ESA det.	Effects
California red-legged frog	Rana draytonii	T, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.; species likely extirpated from valley floor and southern Sierra Nevada foothills.
California tiger salamander, central DPS	Ambystoma californiense	T, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Central Valley steelhead (NMFS)	Oncorhynchus mykiss	T, X	NE	No change in Delta pumping or San Joaquin River flows would occur as a result of the Proposed Action.
Coastal California Gnatcatcher	Polioptila californica californica	T, X	NE	Species' range is outside of the Proposed Action Area.
Conservancy fairy shrimp	Branchinecta conservatio	E, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Delta smelt	Hypomesus transpacificus	T, X	NE	No change in Delta pumping or San Joaquin River flows would occur as a result of the Proposed Action.
Desert tortoise	Gopherus agassizii	T, X	NE	Species' range is outside of the Proposed Action Area.
Fisher	Martes pennanti	PT	NE	This species does not occur at the lower elevations within the Proposed Action Area.
Fresno kangaroo rat	Dipodomys nitratoides exilis	E, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Giant garter snake	Thamnophis gigas	Т	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action; species believed to have been extirpated from Tulare Basin except Burrel/Lanare.
Giant kangaroo rat	Dipodomys ingens	Е	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Greene's tuctoria	Tuctoria greenei	E, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Hairy Orcutt grass	Orcuttia pilosa	E, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Hartweg's golden sunburst	Pseudobahia bahiifolia	E	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.

Species	Scientific Name	Status	ESA det.	Effects
Hoover's spurge	Chamaesyce hooveri	T, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Keck's checker-mallow	Sidalcea keckii	E, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Kern mallow	Eremalche kernensis	E	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Kern primrose sphinx moth	Euproserpinus euterpe	Т	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action; species unlikely to occur in Proposed Action Area as it is only known from the Walker Basin and Carrizo Plain.
Lahontan cutthroat trout	Oncorhynchus clarki henshawi	Т	NE	Species occurs at a higher elevation than the Proposed Action Area.
Least Bell's Vireo	Vireo bellii pusillus	E, X	NE	Species would at most pass overhead during its migration, and would not otherwise use the Proposed Action Area.
Little Kern golden trout	Oncorhynchus aquabonita whitei	T, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Little Kern golden trout critical habitat			NE	Critical habitat for this species does not occur in the Proposed Action Area.
Longhorn fairy shrimp	Branchinecta Iongiantenna	E	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Mariposa pussy-paws	Calyptridium pulchellum	Т	NE	Species occurs at too high an elevation to be within the Proposed Action Area.
Marsh sandwort	Arenaria paludicola	Е	NE	Species occurs at too high an elevation to be within the Proposed Action Area.
Mojave tui chub	Gila bicolor ssp. Mohavensis	E	NE	Species' range is outside of the Proposed Action Area.
Mountain yellow- legged frog	Rana muscosa	E, PX	NE	Species occurs at a higher elevation than the Proposed Action Area.
Owens pupfish	Cyprinodon radiosus	E	NE	Species' range is outside of the Proposed Action Area.
Owens tui chub	Gila bicolor ssp. snyderi	E, X	NE	Species' range is outside of the Proposed Action Area.
Paiute cutthroat trout	Oncorhynchus clarki seleniris	Т	NE	Species occurs at a higher elevation than the Proposed Action Area.

Species	Scientific Name	Status	ESA det.	Effects
Palmate-bracted bird's-beak	Cordylanthus palmatus	E	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Ramshaw Meadows sand-verbena	Abronia alpine	С	NE	Species occurs at a higher elevation than the Proposed Action Area.
San Benito evening- primrose	Camissonia benitensis	Т	NE	Not within Proposed Action Area; limited to serpentine-derived alluvial terraces and deposits near San Benito Mountain, southern San Benito Co. and western Fresno Co.
San Fernando Valley spineflower	Chorizanthe parryi var. fernandina	С	NE	Species' range is outside of the Proposed Action Area.
San Joaquin adobe sunburst	Pseudobahia peirsonii	Т	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
San Joaquin kit fox	Vulpes macrotis mutica	E	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
San Joaquin Valley Orcutt grass	Orcuttia inaequalis	T, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
San Joaquin woolly- threads	Monolopia congdonii	E	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
San Mateo thornmint	Acanthomintha obovata spp. duttonii	Е	NE	Species' range is outside of the Proposed Action Area.
Sierra Nevada bighorn sheep	Ovis Canadensis californiana	E, X	NE	Species occurs at a higher elevation than the Proposed Action Area.
Sierra Nevada yellow- legged frog	Rana sierrae	E, PX	NE	Species occurs at a higher elevation than the Proposed Action Area.
Southwestern Willow Flycatcher	Empidonax traillii extimus	E, X	NE	Species primarily would use higher elevation habitat and only fly over the Proposed Action Area.
Springville clarkia	Clarkia springvillensis	Т	NE	Species occurs at a higher elevation than the Proposed Action Area.
Succulent owl's-clover	Castilleja campestris ssp. succulenta	T, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Succulent owl's-clover critical habitat			NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Tipton kangaroo rat	Dipodomys nitratoides nitratoides	Е	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.

Species	Scientific Name	Status	ESA det.	Effects
Valley elderberry longhorn beetle	Desmocerus californicus dimorphus	T, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Vernal pool fairy shrimp	Branchinecta lynchi	T, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Vernal pool tadpole shrimp	Lepidurus packardi	E, X	NE	No lands fallowed or untilled for three or more years would be converted as a result of the Proposed Action.
Western Snowy Plover	Charadrius alexandrines nivosus	T, X	NE	Species would at most pass overhead during its migration, and would not otherwise use the Proposed Action Area.
Western Yellow-billed Cuckoo	Coccyzus americanus occidentalis	T, PX	NE	Species would at most pass overhead during its migration, and would not otherwise use the Proposed Action Area.
Whitebark pine	Pinus albicaulis	С	NE	Species' range is outside of the Proposed Action Area.
Yosemite toad	Bufo canorus	T, PX	NE	Species occurs at a higher elevation than the Proposed Action Area.

E: Federally listed as endangered

T: Federally listed as threatened

PT: Proposed for listing as threatened

C: Candidate for listing

X: Designated critical habitat

PX: Proposed critical habitat

#### 3.3.2 Environmental Consequences

#### No Action

The No Action Alternative would result in continued transfers and exchanges of water that are approved on a case by case basis. As such, the impacts would be the same as described under the Proposed Action. There would be no impacts to fish and wildlife, listed species or critical habitat.

#### **Proposed Action**

The Proposed Action would not alter CVP operations, water storage or release patterns from CVP facilities, or the maximum volume of water delivered to the Contractors as compared to the No Action Alternative. The transfers and exchanges are water management actions to support existing uses and conditions. No native lands would be cultivated as a result of the Proposed Action. Lands fallowed for three or more years would require surveys for wildlife species including threatened and endangered species prior to application of this water. Subsequent environmental review and consultations, if applicable would be required to irrigate lands fallowed three or more years.

Therefore, biological resource conditions under the Proposed Action would be identical to those under the No Action Alternative and the Proposed Action Alternative would have no effect on federally listed species, critical habitat, or candidate species. Diversions from Millerton Lake would not change. The Proposed Action would not interfere with other management decisions for the Friant Division facilities.

#### **Cumulative Impacts**

Cumulatively this action would have no effect on biological resources in the project area. Transfers and exchanges under the Proposed Action would not result in cumulative impacts to biological resources.

# **Section 4 Consultation and Coordination**

## **4.1 Public Review Period**

Reclamation provided the public with an opportunity to comment on the Draft FONSI and Draft EA during a 30-day public review period. No comments were received.

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# **Section 5 Preparers and Reviewers**

Kelly Baker, Natural Resource Specialist, SCCAO Rain L. Emerson, M.S., Supervisory Natural Resources Specialist, SCCAO Shauna McDonald, Wildlife Biologist, SCCAO Joanne Goodsell, Archaeologist, MP-153 Moses Prieto, Repayment Specialist, SCCAO – reviewer David E. Hyatt, Resources Management Division Chief, SCCAO – reviewer

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# **Section 6 References**

Bureau of Reclamation (Reclamation). 1999. Final Programmatic Environmental Impact Statement for the Implementation of the CVPIA. October 1999.

Bureau of Reclamation (Reclamation). 2011. Final Environmental Assessment and Finding of No Significant Impact. *Accelerated Water Transfer Program for Friant Division and Cross Valley Central Valley Project Contractors*, 2011-2015 (FONSI/EA-10-052). Mid-Pacific Region South-Central California Area Office. Fresno, California.

CNDDB (California Natural Diversity Database). 2015. California Department of Fish and Game's Natural Diversity Database, Government Version.

National Marine Fisheries Service (NMFS). 2009. Final biological opinion and conference opinion on the long-term operations of the Central Valley Project and State Water Project. June 4, 2009.

U.S. Fish and Wildlife Service (USFWS). 2001. Biological Opinion on U.S. Bureau of Reclamation Long Term Contract Renewal of Friant Division and Cross Valley Unit Contracts. January 19, 2001.

U.S. Fish and Wildlife Service (USFWS). 2008. Formal Endangered Species Act consultation on the coordinated operations of the Central Valley Project and State Water Project (81420-2008-F-1481-5). December 15, 2008.

# Appendix A Cultural Resources Determination

# CULTURAL RESOURCES COMPLIANCE Division of Environmental Affairs Cultural Resources Branch (MP-153)

MP-153 Tracking Number: 15-SCAO-267

Project Name: Accelerated Water Transfer and Exchange Program for Friant Division and

Cross Valley Contractors - Contract Years 2016-2020

**NEPA Document:** EA-15-018

**NEPA Contact:** Kelly Baker, Natural Resources Specialist

MP-153 Cultural Resources Reviewer: Joanne Goodsell, Archaeologist

Date: September 23, 2015

Reclamation proposes to implement an accelerated process for annual water transfers and/or exchanges pursuant to Section 3405(a) of the CVPIA for Contract Years 2016 through 2020 (March 1, 2016 to February 29, 2020). The proposed action would cover transfers and/or exchanges between Friant Division contractors and transfers from Friant Division contractors to Cross Valley Contractors pursuant to specified CVPIA criteria. No new construction or modification of existing facilities would take place as part of the proposed action.

Reclamation has determined that the proposed action is the type of undertaking that does not have the potential to cause effects on historic properties, should such properties be present, pursuant to 36 CFR § 800.3(a)(1). As such, Reclamation has no further obligations under 54 U.S.C. § 306108, commonly known as Section 106 of the National Historic Preservation Act (NHPA).

This document conveys the completion of the cultural resources review and NHPA Section 106 process for this undertaking. The proposed action would result in no impacts to cultural resources. Please retain a copy with the administrative record for the proposed action. Should the proposed action change, additional review under Section 106, possibly including consultation with the State Historic Preservation Officer, may be required.