



United States Department of the Interior

FISH AND WILDLIFE SERVICE

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IN REPLY REFER TO:
1-1-07-TA-1499

AUG 16 2007

Dennis Falaschi
General Manager
Panoche Drainage District
52027 W. Althea Avenue
Firebaugh, California 93622

Subject: Draft Mitigated Negative Declaration and Initial Study for San Joaquin River Water Quality Improvement Project, Phase I, Part 2, Panoche Drainage District's Drainage Reuse Facility Expansion

This letter responds to your submission of additional information regarding the proposed expansion of Panoche Drainage District's Drainage Reuse facility (SJRIP expansion). The additional information you provided was in response to our May 25, 2007 written request for additional information, a phone call on June 4, 2007 between the Service and Joe McGahan of Summers Engineering, and a conference call on June 8, 2007 that included representatives from the Service, the U.S. Bureau of Reclamation, the California Department of Fish and Game, Summer's Engineering, HT Harvey and Associates, URS Corporation and Panoche Drainage District. We received two e-mails on July 11, 2007 from Joe McGahan submitting additional information responding to our questions. We received, under a separate e-mail dated July 16, 2007 further information we had requested: a progress report compiled by the U.S. Bureau of Reclamation on the status of compliance with the Grassland Bypass Project Biological Opinion's conservation measures and terms and conditions (GBP Status Report). We had asked for 30 day time period to review the additional information you were to provide. That 30-day time period ends on August 16, 2007. Our comments are provided in accordance with the Federal Endangered Species Act of 1973, as amended (16 U.S.C. 1531 et seq.)(Act).

In addition to the information noted above, we have also reviewed the following information, relevant to this project for this letter:

- The April 2007 Draft Mitigated Negative Declaration and Initial Study for the Joaquin River Water Quality Improvement Project (Draft MND&IS);
- The December 2005 In-Valley Treatment / Drainage Reuse Facility Expansion Biotic Study;
- The 2003 Grassland Bypass Project Biological Opinion Status Report compiled by the U.S. Bureau of Reclamation;

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- The 2001 Biological Opinion on the Grassland Bypass Project (Service File No., 01-F-153);
- The 2001 Biological Assessment for the Grassland Bypass Project;
- And other information in our files.

Proposed Expansion of the Grassland Bypass Project's Reuse Facility

Panoche Drainage District (PDD) conducted an Initial Study and adopted a Negative Declaration on September 19, 2000 for the acquisition of up to 6,200 acres of land for the irrigation of salt-tolerant crops with subsurface drainage water (drainage reuse). The project was designed to immediately reduce discharges to the San Joaquin River from approximately 97,400 acres participating in the Grassland Bypass Project and was designated the "San Joaquin River Improvement Project" (SJRIP). On May 25, 2001, the Final EIS/EIR for the Grassland Bypass Project was completed (2001 EIS/EIR), analyzing the environmental effects of continued use of the San Luis Drain to convey subsurface agricultural drainage out of the Grassland Drainage Area ("GDA"). This document incorporated into the project the "In-Valley Treatment/Drainage Reuse" feature for the entire 6,200 acres. The Service completed a biological opinion on the Grassland Bypass Project on September 27, 2001 that included up to 6,200 acres of agricultural land that would be converted to reuse. Using grant funding from the State of California, PDD acquired 4,000 acres of land, but due to lack of funding, did not acquire the final 2,200 acres.

In addition to the 2,200 acres planned for purchase that was analyzed in the 2000 Initial Study, an additional 400 to 700 acres within a 6,100 acre area discussed in the 2007 Draft MND&IS are being considered for purchase, which would result in a total area of 6,900 acres dedicated to drainage reuse. The Draft MND&IS for the proposed expansion of the SJRIP reuse area (SJRIP expansion) was intended to supplement the 2000 Initial Study, provide updates, and analyze the effects of utilizing several alternate sites. This study considered the use of some of the 6,100 identified potential target acres for a short duration (1 -5 years) until funding is available to purchase the up to 2,900 acres necessary for the permanent project. Land utilized for the short-term project would be capable of full restoration to agricultural land and would not necessarily be the same land within the target area that will ultimately be acquired for permanent, long-term project implementation. All of the lands identified for the Proposed Project are located in the GDA and lie within, or adjacent to the boundaries of one or more of the following: Central California Irrigation District (CCID), Eagle Field Water District, Mercy Springs Water District, Oro Loma Water District, PDD and San Luis Water District located in western Fresno and Merced Counties. The lands are surrounded by agricultural land in a rural agricultural setting. A portion of the lands being considered for the SJRIP expansion are bounded to the North by privately owned wetlands in the South Grasslands. The lands are generally bounded by the Delta-Mendota Canal to the south and the Main Canal to the north. The lands extend to the west 7 miles west of Russell Avenue and to the east to approximately Fairfax Avenue.

PDD is acting as lead agency for purposes of complying with the California Environmental Quality Act for this Project because it owns and is the primary operator of the SJRIP regional

reuse facility. The Proposed Project will either be added to the SJRIP-Phase I In-Valley Reuse/Treatment Facility or will be operated in coordination with it. PDD will act as the Lessee of reuse areas acquired on an interim basis and is expected to operate the lands in the expanded reuse area once permanent land is acquired. Depending upon the source of funding used to acquire the permanent acreage for this project and the form of agreements entered into by project participants, the land and facilities would be owned by one or more of the entities utilizing the reuse area, such as Panoche Drainage District, Panoche Water District or Firebaugh Canal Water District; the San Luis & Delta-Mendota Water Authority on behalf of the project participants, including PDD; or a new Joint Power Authority of which PDD is a member.

Listed Species Issues

Acreage of Proposed Action Exceeds what was Analyzed in Grasslands Bypass Biological Opinion

One of the issues we raised in our conference call on June 8, 2007 was that the total acreage of the proposed action exceeds what was analyzed in the 2000 EIS/EIR and in the Grassland Bypass Project Biological Opinion. The additional materials you provided on July 11, 2007 acknowledged the following, "The Project proponent understands that consultation must be reinitiated with the Service prior to exceeding a total project area of 6200 acres..." and "The Project proponent understands that consultation with the Service must be reinitiated if any of the additional lands occur outside of the area depicted in Figure 2-3 of the Biological Opinion (Service 2001, 1-1-01-F-0153)."

San Joaquin Kit Fox

The Biotic Study (H.T. Harvey & Associates 2005) identified within the area being considered for this project approximately 249 acres of alkali scrub habitat (occurring within 2 parcels, a 151-acre parcel and a 98-acre parcel) north of the Outside Canal. The Biotic Study described these lands as being comprised of disturbed, iodine-bush dominated grasslands and alkali flats that have most recently been used for grazing cattle. As a followup to our June 2007 conference call, H. T. Harvey & Associates conducted a survey of the Project area on 11 June 2007 to assess changes in habitat suitability for the San Joaquin kit fox (*Vulpes macrotis mutica*) since the original surveys conducted in September and October 2005 (followup survey). This followup survey found that conditions within these parcels have changed since the surveys conducted in 2005. The 98-acre parcel was put back into the crop rotation cycle and had been recently disked prior to the survey conducted on 11 June 2007. The 151-acre parcel was found to be more mesic than observed in 2005 and was described as supporting 3 sensitive habitats: alkali scrub (81 acres), freshwater marsh (4.7 acres), and alkali meadow (55 acres). The freshwater marsh on this parcel was described as having been artificially created by agricultural drainage, and thus are not connected to off-site waterways, and do not, therefore, appear to qualify as "Waters of the U.S." under provisions of Section 404 of the Clean Water Act (1972).

The additional material you provided also noted the following, “We understand that the 151-acre parcel comprising alkali scrub, alkali meadow, and freshwater marsh habitats will not be utilized for the IVTDR Project element of the Grassland Bypass Project.” It is unclear if this is a firm, environmental commitment for this project.

The followup survey also involved identifying the location and extent of habitat potentially suitable for foraging and denning of San Joaquin kit fox, including alkali scrub, ruderal, and fallowed fields—defined here as fields that have been fallow for more than one crop cycle. In addition, walking, transect surveys within these habitats were conducted on 12 and 13 June 2007 to identify active and potential kit fox dens. No active kit fox dens, scats, nor tracks were observed during the walking transect surveys conducted on 12 and 13 June 2007. However, potential dens (burrows with entrances measuring 5 to 6 inches in diameter) were found within 1 fallow field north of the Outside Canal. The potential dens were determined to be active or recently active California ground squirrel (*Spermophilus beechyi*) burrows with no evidence of kit fox use.

Compliance with Grasslands Bypass Project Biological Opinion

The 2001 Grassland Bypass Project biological opinion (GBP BO) included the following Conservation Measure included in the project description by Reclamation to avoid or minimize impacts to San Joaquin kit fox: “*A monitoring program and contingency plan will be designed with recommendations from the Service to address potential San Joaquin kit fox exposure to selenium. Selenium uptake by salt-tolerant crops irrigated with drainwater at the IVT will continue to be monitored. If selenium concentrations in these crops reach the Level of Concern threshold for dietary effects on mammals (3 mg/kg), a contingency plan and monitoring program will be instituted to determine selenium dietary effects on the small mammal prey of San Joaquin kit fox.*” Further, the terms and conditions for the GBP BO included the following relevant to SJRIP: “*Reclamation and/or the Authority will establish and commence implementation of a tiered contaminant monitoring program within 9 months of this opinion, in collaboration with the Service’s Endangered Species and Environmental Contaminants Divisions of the SFWO, that will be sufficient to evaluate the safety of IVT lands for wildlife generally and specifically to identify the potential for dietary exposure to selenium of San Joaquin kit fox and mountain plover. Monitoring data will be compared with the ecological risk guidelines for selenium found in Table 1 on page 31 of the biological assessment (also table E2-1 in appendix E2 of the final Environmental Impact Statement and Environmental Impact Report for the Grasslands Bypass Project). For monitored media and analytes not covered by these ecological risk guidelines (i.e., selenium in fur, mercury in bird eggs etc.) the interpretive criteria for adverse effect shall be drawn from a review of the scientific literature. In addition, boron will be monitored long enough in biota at the IVT site to reasonably establish what the avian exposure to this constituent is.*”

The materials you provided on July 16, 2007 included the second GBP Status Report, reporting the status of compliance with the GBP BO. The GBP Status Report noted the following with respect to a reuse area monitoring program: “*The vegetation monitoring program was initiated in 2001. Various plants have been sampled in the 2001 to 2006 time period for selenium. This*

information is included in Table 7.” This monitoring program was not implemented as was required in the GBP BO, as part of a tiered contaminant monitoring program established in collaboration with the Service. The vegetation data reported from the SJRIP were apparently collected from several different research efforts and are highly variable. This may in part be due to time of year or plant parts collected (which were not reported in the Table). Reclamation averaged the plant data by species resulting in average selenium concentrations that fell below the 3 mg/kg dietary threshold. However, Reclamation’s commitment in the GBP BO did not specify that this threshold would apply to averages. The data in Table 7 (attached below) do indicate that some plant tissues sampled exceed the 3 mg/kg selenium concentration identified as a level of concern for plant tissues. Such selenium concentrations in plants at the SJRIP site could result in increases in the food chain including prey species of San Joaquin kit fox above levels of concern.

Planting of salt-tolerant crops such as alfalfa, pasture, and bermuda grass in the SJRIP site is likely to provide a low-horizon habitat that could be used by San Joaquin kit foxes and their prey. The diet of kit foxes is principally based on seed-eating nocturnal rodents. The potential exists for selenium to bioaccumulate in the food-chain of the San Joaquin kit fox at the IVT site: from applied drain water to plants to prey animals to foxes. Kit fox forage extensively within a large area of grasslands and cultivated fields, which reduces the potential that these species would ingest toxic quantities of prey from the IVT site. However, impacts to a kit fox may occur if a significant portion of its home range overlaps the IVT area. Kit fox populations are found in the Panoche Hills and east of the San Joaquin River (Harris 2000). Although active dens were not found in the area of the proposed action, kit fox may still be present or may move into the area in the future. The project site is well within the current range of the San Joaquin kit fox. The presence of farming within and around the project site does not preclude its use by kit fox. Given the fact that selenium concentrations in some plant material collected from the SJRIP site exceeded 3 mg/kg, the Service believes that take of San Joaquin kit fox may occur from bioaccumulation of selenium in their prey.

The Service also finds that the following GBP BO terms and conditions related to kit fox and reuse have not adequately been implemented:

“The following terms and conditions implement reasonable and prudent measure number III, to minimize the incidental take of listed species associated with implementation of the In-Valley-Treatment element of the Grassland Bypass Project for San Joaquin kit fox.

III. B. Reclamation and/or the Authority will establish and commence implementation of a tiered contaminant monitoring program within 9 months of this opinion, in collaboration with the Service’s Endangered Species and Environmental Contaminants Divisions of the SFWO, that will be sufficient to evaluate the safety of IVT lands for wildlife generally and specifically to identify the potential for dietary exposure to selenium of San Joaquin kit fox and mountain plover. Monitoring data will be compared with the ecological risk guidelines for selenium found in Table 1 on page 31 of the biological assessment (also table E2-1 in appendix E2 of the final Environmental Impact Statement and Environmental Impact Report for the Grasslands Bypass Project). For monitored media

and analytes not covered by these ecological risk guidelines (i.e., selenium in fur, mercury in bird eggs etc.) the interpretive criteria for adverse effect shall be drawn from a review of the scientific literature. In addition, boron will be monitored long enough in biota at the IVT site to reasonably establish what the avian exposure to this constituent is.

- III. C. Reclamation and/or the Authority will implement any measures identified by the Service, including ~~hazing or other appropriate measures, as necessary for remediation of adverse effects to mountain plover. If ponding or other conditions are found such that wildlife exposure to contaminants is detected, irrigation of the IVT field will cease until an irrigation method that does not produce the adverse condition is identified and implemented.~~*
- III. D. Reclamation and/or the Authority will implement the reasonable measures identified by the Service as necessary for remediation of adverse effects to San Joaquin kit fox associated with IVT lands.*
- III. E. Data from the IVT Monitoring Program shall be provided to the Environmental Contaminants and Endangered Species Divisions of the SFWO at least annually for review.*
- III. F. Reclamation and/or the Authority shall fully fund the IVT Monitoring Program for a 5-year period. At the end of the 5-year monitoring program the Service will review the existing data and determine if and where monitoring needs to continue. Reclamation will continue to fund subsequent IVT contaminant monitoring until 2010 if the Service determines it is necessary."*

Table 7. Plant Selenium Analysis within SJRIP Reuse Area.

Sample Date	Crop	Location		Se (mg/kg - dry weight basis)	Average
		Section T/R	Field		
6/7/2001	Allalfa	2	12/12	2-4 East	0.60
6/7/2001	Allalfa	2	12/12	2-4 West	0.71
6/7/2001	Pasture	2	12/12	2-8 East	0.79
6/7/2001	Pasture	2	12/12	2-8 West	1.68
					0.945
6/8/2001	Allalfa	10	12/12	10-6 East	0.54
6/8/2001	Allalfa	10	12/12	10-8 West	0.29
6/8/2001	Pasture	10	12/12	10-7 East	0.90
6/8/2001	Pasture	10	12/12	10-7 West	1.28
					0.773
6/22/2002	Grass	2	12/12	2-7	3.57
6/22/2002	Grass	10	12/12	10-4	4.25
6/22/2002	Grass	10	12/12	10-7	0.425
					2.76
4/9/2003	Allalfa	14	12/12	14-1	0.580
					0.580
6/21/2005	Jose Tall Wheatgrass	10	12/12	10-6	0.74
					0.740
12/13/2005	Grape Leaves	27	12/12		0.601
12/13/2005	Allalfa	35	12/12		0.891
12/13/2005	Tomatoes	4	12/12		0.556
12/13/2005	Almond Leaf	4	12/12		0.365
					0.586
12/14/2005	Jose Tall Wheatgrass	10	12/12	10-1	0.478
12/20/2005	Allalfa	10	12/12	10-1	2.39
12/20/2005	Allalfa	14	12/12	14-1	0.629
12/20/2005	Pasture	14	12/12	14-2	3.18
					1.65
5/16/2006	Jose Tall Wheatgrass	10	12/12		1.00
5/16/2006	Pasture	3	12/12		1.49
5/16/2006	Pasture	2	12/12		0.701
5/17/2006	Allalfa	10	12/12		0.966
5/17/2006	Pasture	2	12/12		2.09
5/18/2006	Asparagus	13	12/12		3.80
5/18/2006	Pasture	14	12/12		1.08
5/18/2006	Allalfa	14	12/12		1.81
5/18/2006	Allalfa	13	12/12		2.06
5/23/2006	Allalfa	13	12/12		1.41
					1.70
8/24/2006	Fallow	11	12/12		3.83
8/24/2006	Allalfa	13	12/12		3.20
8/24/2006	Pistachio Foliage	14	12/12		0.789
8/24/2006	Jose Tall Wheatgrass	10	12/12		1.22
8/29/2006	Pistachio Nuts	14	12/12		0.239
					1.81
8/24/2006	Allalfa	1	12/11		0.105
8/29/2006	Grapes	27	12/12		<0.020
8/29/2006	Tomatoes	33	12/12		<0.020
					0.048

Reuse Area Average 1.97

	South Dakota Data
	Gary Benneke, USDA Data
	South Dakota Data, outside of SJRIP
	DSK Data

Giant Garter Snake

The 2005 Biotic Study identified over 1,600 acres of rice fields in the area being considered for the SJRIP expansion. The 2007 followup survey conducted by H.T. Harvey & Associates found ~~no rice fields currently under cultivation in the SJRIP expansion area. The followup survey did~~ however find suitable habitat for giant garter snakes (*Thamnophis gigas*) exists in several areas of freshwater marsh within the 151-acre parcel bounded by the Main Canal. Suitable habitat for giant garter snakes also exists in several irrigation canals within the area being considered for expansion of the IVTDR Project. The 151-acre parcel contains a series of marshes created by runoff from crop irrigation. It is unclear what the crop runoff is (e.g., surface or subsurface drainage) or what the quality of water is in these marshes. The marshes and some of the irrigation canals contain dense stands of bulrushes (*Scirpus* spp.) and cattails (*Typha* spp.). Potential prey for giant garter snakes, including bullfrogs (*Rana catesbeiana*), mosquitofish (*Gambusia affinis*), and common carp (*Cyprinus carpio*), were observed in several of the canals.

The supplemental material you provided on July 11, 2007 included a commitment that the proposed SJRIP expansion would implement the following avoidance and minimization measures, in accordance with the GBP BO:

- All suitable giant garter snake habitats will be surveyed at least 6 months before construction begins. If giant garter snakes are found or their habitat may be affected, consultation with the Service will be required.
- Construction activity within giant garter snake habitat will be limited to May 1 through October 1, when the snakes are usually active. Other construction times would require additional guidance from the Service to determine if additional measures are necessary, as giant garter snakes are more susceptible to take in the form of injury or mortality when occupying underground burrows or crevices. Suitable giant garter snake habitat will be surveyed for the snake 24 hours prior to construction activities, and any sightings reported to the Service. Survey of the suitable habitat will be repeated if a lapse in construction activity of two weeks or greater has occurred. Construction personnel will receive Service-approved worker awareness training to instruct workers to recognize the snake and its habitat.
- Giant garter snake habitat within and adjacent to construction sites will be flagged as environmentally sensitive areas. Movement of heavy equipment to and from construction sites, staging areas, or borrow sites will be confined to existing roadways to minimize habitat disturbance. Equipment and construction activities will keep at least 200 feet from giant garter snake aquatic habitat to avoid impacts. If construction activities must occur less than 200 feet from habitat, the affected area will be confined to the minimum necessary for construction activities. A Service-approved biologist will be on site during clearing and grubbing of wetland vegetation. Any dewatered habitat will remain dry for at least 15 consecutive days after April 15 and prior to excavating or filling of the dewatered habitat. If a snake is encountered during construction, activities will stop until it successfully escapes the project area or until capture and relocation have been

completed by a Service-approved biologist. Temporary-disturbance areas will be returned to pre-project conditions following construction.

- A Service-approved biologist will inspect the sites of proposed culverts. The same protocols will be implemented for pre-construction surveys, monitoring, and avoidance of giant garter snakes where suitable habitat is present.

In addition, the Draft MND&IS included mitigation actions that would reduce avian nesting attractiveness in and near irrigation ditches including:

- Removing sediment that has collected on the bottom of irrigation ditches. Removing sediment that has collected on the bottom of irrigation ditches would remove potential nest substrate when water levels are low.
- Smoothing ditch banks and borders, and removing weedy vegetation would reduce the attractiveness of the area for nesting. In addition, any deep drains not required for Project purposes will be closed by bulldozing with earthfill.
- Remaining drains that are determined to be an exposure risk for wildlife will be netted and/or replaced with subsurface pipelines. Construction activities to fill or pipe drains will be conducted after biological surveys and any required steps to avoid construction effects for special status species.

Giant Garter snakes in the vicinity of the SJRIP expansion area

Upon federal listing in 1993, the Service identified 13 separate populations of giant garter snakes, with each population representing a cluster of discrete locality records (Service 1993). One of those populations, is just to the north of the proposed SJRIP expansion area (North and South Grasslands). During 1995 surveys of prior locality records and adjacent waterways, one road-killed giant garter snake was found, and three presumed giant garter snakes were observed but not captured. Two of the sightings occurred several miles south of the town of Los Banos in the South Grasslands (Hansen 1996). In April 1998 the Dixon Field Station of the Western Ecological Research Center (U.S. Geological Survey) implemented a trapping survey which yielded one capture in the south Grasslands. In 1999, M. Paquin of the U.S. Geological Survey conducted walking surveys in the South Grasslands during May and June 1999. Three snakes were located as a result of the surveys, two road kills and one live-capture. The live snake was captured in the Agatha Canal, one road kill was found on Santa Fe Grade Road, and one on Mallard Road near the Agatha Canal (Beam *et al.*, 1999). The sightings are within or near the Grassland Wetland Supply Channels, where water quality has improved since the onset of the Grassland Bypass Project but continues to be impacted by selenium contaminated drainage. In 2001, CDFG continued surveys for giant garter snake in the Grassland Ecological Area (Merced County) which yielded the capture of one individual in the South Grasslands. In 2006, E. Hanson conducted surveys at fifty unique locations in the Grasslands Ecological Area, including Grasslands WD and the Agatha Canal. That trapping effort yielded one individual caught in the South Grasslands at the Agatha Canal, just a few miles north of the proposed SJRIP expansion area.

Changes in land management practices in the South Grasslands

Giant garter snakes may occur in permanent aquatic habitat or habitats seasonally flooded during the snakes' active season (early-spring through mid-fall), such as marshes, sloughs, ponds, low gradient streams, irrigation and drainage canals, and rice fields. Irrigation of private duck clubs in the Grasslands for pasture once provided summer water in canals, sloughs, and other water conveyance systems throughout the basin. Maintaining pastures in summer for cattle grazing required regular irrigation and flooding of pastures (Paquin et al. 2006). However, in the mid-1970's, private duck clubs were encouraged to withhold grazing and to change their focus to moist-soil management (Beam and Menges 1997). Summer water for wetlands in the private duck clubs of the Grasslands is provided from Central Valley Project Improvement Act (CVPIA) level 4 refuge water supplies. Deliveries of level 4 to the Grasslands duck clubs have fallen well short of Congressional mandates identified in the CVPIA. When level 4 supplies are made available, the Grassland Water District generally isn't notified by Reclamation of such availability until August. This further reduces the likelihood that summer water habitat will be made available on the private duck clubs of the Grasslands (pers. comm. K. Forrest, Refuge Manager, San Luis National Wildlife Area Complex, June 13, 2007). These land management changes and reduced summer water have coincided with the apparent declines of giant garter snake populations in the Grasslands Wetlands (Beam and Menges 1997, G. Hansen 1988, G. Hansen 1996, Paquin et al. 2006).

In studies conducted on giant garter snakes in the Natomas Basin and Colusa National Wildlife Refuge, individual snakes have been documented moving up to 8 kilometers (5 miles) over a few days in response to dewatering of habitat (Wylie *et al.* 1997), to use up to more than 12.9 kilometers (8 miles) of linear aquatic habitat over the course of a few months, and snake home range has been shown to be as large as 3744 hectares (14.5 miles²) (Wylie and Martin 2004). No telemetry studies have yet been completed on giant garter snakes in the San Joaquin Valley.

The Service believes that the proposed SJRIP expansion may result in take of giant garter snake. Our conclusion is based on the following:

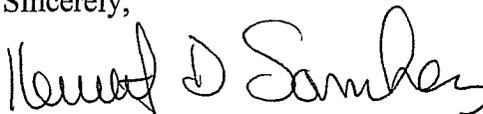
- Close proximity of a known population of snakes in the South Grasslands to the proposed SJRIP expansion area;
- Ability of snakes to move several miles in response to dewatering of habitat;
- Limited availability of summer water habitat in the South Grasslands;
- Proposed SJRIP expansion includes an area of 1,600 acres that was cultivated as rice as recently as 2005, just to the south of Agatha Canal;
- Open ditches conveying selenium contaminated drainage to the SJRIP expansion area in the summer could serve as an attractive nuisance to snakes;
- Proposed netting of ditches will be insufficient to prevent access by giant garter snakes;
- And, the unknown nature (source and quality) of water in the series of marshes identified by H.T. Harvey and Associates in the 151-acre parcel in 2007.

Conclusion

Based on the information you have provided in addition to information in our files, we have concluded that the project as defined, could result in take of San Joaquin kit fox and/or giant garter snake. We therefore, request that Panoche Drainage District pursue incidental take authority under the Act, either under section 10, or under section 7 by reinitiating the Grassland Bypass Project's section 7 consultation through the Bureau of Reclamation. Because several commitments in the project description and terms and conditions of the GBP BO have not adequately been implemented, reinitiation of the GBP BO is warranted.

The Service appreciates the extension of the comment period on the Draft MND&IS and the additional information that was provided for review of the proposed SJRIP expansion. We look forward to working with you to ensure that your project is implemented in a manner that will not adversely affect listed species. Should you have any questions about this letter, please contact Susan Jones or Joy Winckel of my staff at the letterhead address, or at 916 414-6600.

Sincerely,



Kenneth D. Sanchez
Acting Field Supervisor

cc: Regional Director, Mid-Pacific Region, U.S. Bureau of Reclamation

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