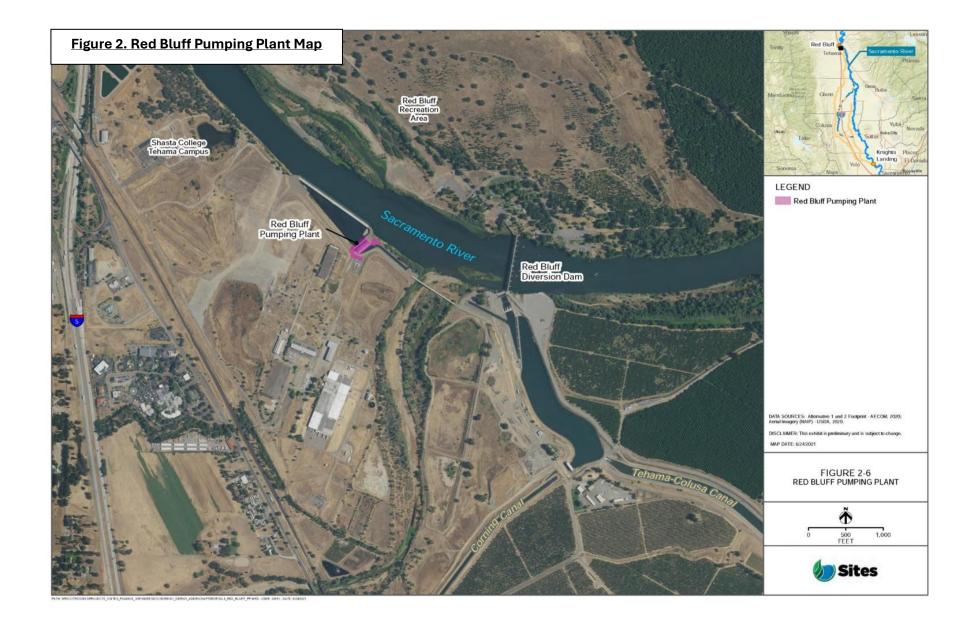
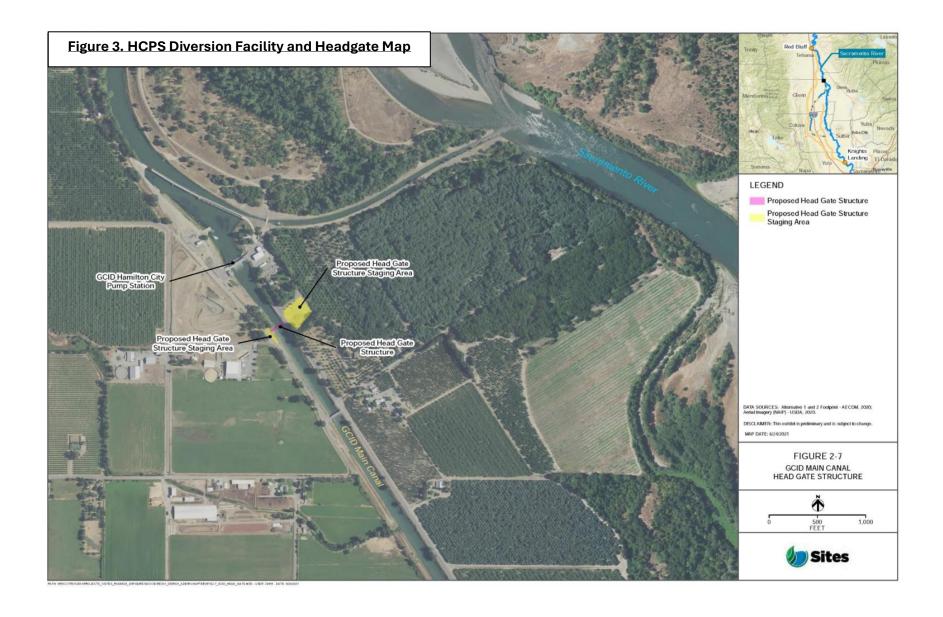
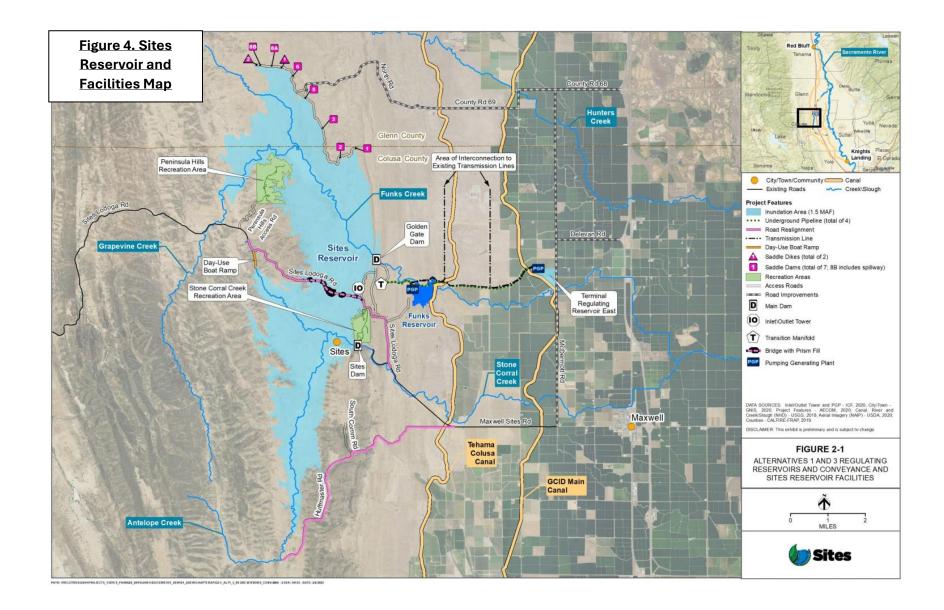
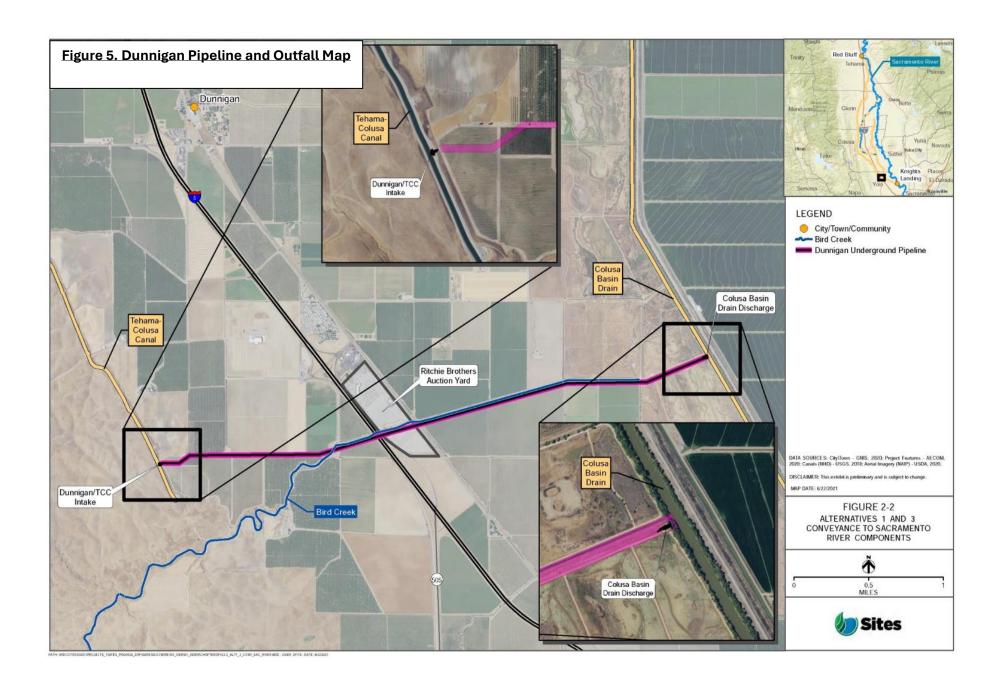


Figure 3-1. Action Area









Attachment 1

CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE MITIGATION MONITORING AND REPORTING PROGRAM (MMRP) CALIFORNIA ENDANGERED SPECIES ACT

INCIDENTAL TAKE PERMIT NO. 2081-2023-051-00

PERMITTEE: Sites Project Authority

PROJECT: Operations of the Sites Reservoir Project

PURPOSE OF THE MMRP

The purpose of the MMRP is to ensure that the impact minimization and mitigation measures required by the Department of Fish and Wildlife (CDFW) for the above-referenced Project are properly implemented, and thereby to ensure compliance with section 2081(b) of the Fish and Game Code and section 21081.6 of the Public Resources Code. A table summarizing the mitigation measures required by CDFW is attached. This table is a tool for use in monitoring and reporting on implementation of mitigation measures, but the descriptions in the table do not supersede the mitigation measures set forth in the California Incidental Take Permit (ITP) and in attachments to the ITP, and the omission of a permit requirement from the attached table does not relieve the Permittee of the obligation to ensure the requirement is performed.

OBLIGATIONS OF PERMITTEE

Mitigation measures must be implemented within the time periods indicated in the table that appears below. Permittee has the primary responsibility for monitoring compliance with all mitigation measures and for reporting to CDFW on the progress in implementing those measures. These monitoring and reporting requirements are set forth in the ITP itself and are summarized at the front of the attached table.

VERIFICATION OF COMPLIANCE, EFFECTIVENESS

CDFW may, at its sole discretion, verify compliance with any mitigation measure or independently assess the effectiveness of any mitigation measure.

TABLE OF MITIGATION MEASURES

The following items are identified for each mitigation measure: Mitigation Measure, Source, Implementation Schedule, Responsible Party, and Status/Date/Initials. The Mitigation Measure column summarizes the mitigation requirements of the ITP. The Source column identifies the ITP condition that sets forth the mitigation measure. The Implementation Schedule column shows the date or phase when each mitigation measure will be implemented. The Responsible Party column identifies the person or agency that is primarily responsible for implementing the mitigation measure. The Status/Date/Initials column shall be completed by the Permittee during preparation of each Status Report and the Final Mitigation Report, and must identify the implementation status of each mitigation measure, the date that status was determined, and the initials of the person determining the status.

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
BE	FORE INITIATION OF COVERED ACTIVITIES AND/OR OPERATIONS				
1	Designated Representative. Permittee shall designate a representative (Designated Representative) responsible for communications with CDFW and overseeing compliance with the ITP. Permittee shall notify CDFW in writing within thirty days of issuance of the ITP of the Designated Representative's name, business address, and contact information, and shall notify CDFW in writing if a substitute Designated Representative is selected or identified at any time during the term of the ITP.	ITP Condition # 7.1	Within 30 days issuance of the ITP	Permittee	
2	Designated Fisheries Biologist(s). Permittee shall submit to CDFW in writing the name, qualifications, business address, and contact information of the Designated Fisheries Biologist(s) using the Biologist Resume Form (Attachment 2) or another format containing the same information at least thirty days before starting Covered Activities. Permittee shall ensure that the Designated Fisheries Biologist(s) are knowledgeable and experienced in the biology, natural history, collecting and handling of the Covered Species. The Designated Fisheries Biologist(s) shall be responsible for monitoring Covered Activities to help minimize and fully mitigate or avoid the incidental take of individual Covered Species and to minimize disturbance of Covered Species' habitat. Permittee shall obtain CDFW approval of the Designated Fisheries Biologist(s) in writing before starting Covered Activities and shall also obtain approval in advance, in writing, if the Designated Fisheries Biologist(s) must be changed. A Designated Fisheries Biologist is an individual who shall meet, at minimum, the following requirements: 1) has a degree in biology; 2) has a minimum of five years of academic training and professional experience in aquatic ecology, ichthyology, marine biology or closely related field; 3) has at least two years of direct experience handling at least one of the special status fish species that may occur within the Project work area; and 4) is in possession of appropriate State and Federal permits to handle special status species of fish that may occur within the Project work area.	ITP Condition # 7.2	Before initiation of Covered Activities	Permittee	
3	Education Program. Permittee shall conduct an education program for all persons employed or otherwise working in the Project Area (applies to limited maintenance actions only) before performing any work related directly to the Designated Fisheries Biologist Onsite Monitoring Requirements. The program shall consist of a presentation from the Designated Fisheries Biologist that includes a discussion of the biology and general behavior of the Covered Species, information about the distribution and habitat needs of the Covered Species, sensitivity of the Covered Species to human activities, its status pursuant to CESA including legal protection, recovery efforts, penalties for violations and Project-specific protective measures described in the ITP. Permittee shall prepare and distribute wallet-sized cards or a fact sheet handout containing this information for workers to carry in the Project Area. Permittee shall provide interpretation for non-English speaking workers, and the same instruction shall be provided to any new workers before they are authorized to perform work in the Project Area (applies to limited maintenance activities only). Upon completion of the program, employees shall sign a form stating they attended the program and understand all protection measures. This training shall be repeated at least once annually for long-term and/or permanent employees that will be conducting work in the Project Area (applies to limited maintenance activities only).	ITP Condition # 7.5	Before initiation of Covered Activities	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
4	Notification Before Commencement. The Designated Representative shall notify CDFW fourteen calendar days before starting Covered Activities including any diversion facility testing events, and prior to diversion operations for the initial season by Permittee. Permittee shall document compliance with all pre-Project Conditions of Approval before starting Covered Activities.	ITP Condition # 8.1	Before Initiation of Covered Activities and Before initiation of Operations	Permittee	
5	Habitat Management Land Acquisition and Permittee Responsible Mitigation. CDFW has determined that permanent protection and perpetual management of compensatory habitat is necessary and required pursuant to CESA to fully mitigate Project related impacts of the taking on the Covered Species that will result from implementation of the Covered Activities. This determination is based on factors including an assessment of the importance of the habitat in the Project Area, the extent to which the Covered Activities will impact the habitat, and CDFW's estimate of the protected acreage required to provide for adequate compensation.	ITP Condition # 10 (See Appendix I of this MMRP for Table 5)	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
	To meet this requirement, the Permittee shall either purchase 378.4 acres of Covered Species credits specified in Table 5 of the ITP (Covered Species Impacts, Compensatory Mitigation, and Cost Estimates) from a CDFW-approved mitigation or conservation bank pursuant to Condition of Approval 10.4 below AND/OR shall provide for both the permanent protection and management of the 378.4 acres of Habitat Management (HM) lands, as specified in Table 5 of the ITP, pursuant to Condition of Approval 10.5 below and the calculation and deposit of the management funds pursuant to Condition of Approval 10.6 below. Purchase of Covered Species credits OR permanent protection and funding for perpetual management of HM lands must be complete before starting Covered Activities, or Security must be provided as specified in Condition of Approval 11 below for all uncompleted obligations.				
	Permittee's implementation of the protection, restoration or perpetual management of HM lands may require separate CEQA evaluation. Because no take authorization is provided through this permit for the HM lands activities, Permittee shall obtain CESA authorization as necessary to implement HM land requirements. All individual protection and restoration projects proposed to achieve the compensatory habitat required in this Condition of Approval shall be subject to CDFW approval (in writing).				
6	Longfin Smelt and Delta Smelt Compensatory Habitat: Permittee shall purchase a total of 13.2 acres of tidal habitat identified in Table 5 of the ITP, of Covered Species credits from a CDFW-approved mitigation or conservation bank AND/OR shall provide for both the permanent protection and management of 13.2 acre of HM Lands for LFS and DS as specified in the ITP. Permittee may be subject to the permanent protection and management of an additional 13.2 acres of tidal habitat and subject to an amendment, as specified in Section 6 of the ITP, if the 13.2 acres of tidal habitat does not support both LFS and DS.	ITP Condition # 10	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
7	Winter-Run and Spring-Run Chinook Salmon Dual or Stacked Compensatory Habitat: Permittee shall purchase a total of 356 acres of off-channel rearing habitat and a total of 9.2 acres of wetland bench habitat identified in Table 5 of the ITP, of Covered Species credits from a CDFW-approved mitigation or conservation bank AND/OR provide for both the permanent protection and management of 356 acres of off-channel rearing habitat and a total of 9.2 acres of wetland bench habitat of HM Lands for CHNWR and CHNSR. Alternatively, upon written approval from CDFW, Permittee may purchase a total of 178 acres of dual or stacked CHNWR and CHNSR off-channel rearing habitat and 4.6 acres of dual or stacked CHNWR and CHNSR wetland bench habitat from a CDFW - approved mitigation or conservation bank; AND/OR may provide for the permanent protection and management of 178 acres of dual or stacked CHNWR and CHNSR off-channel rearing habitat and 4.6 acres of dual or stacked CHNWR wetland bench habitat for HM Lands. Permittee shall provide supporting documentation to confirm the compensatory habitat (credits or HM Lands) supports both CHNWR and CHNSR as specified below (Winter-Run and Spring Run Chinook Salmon Compensatory Habitat) and as specified in Condition of Approval 11.1.1 (Reduced Security for Dual or Stacked Salmonid Species Habitat Types).	ITP Condition # 10	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
8	Winter-Run and Spring-Run Chinook Salmon Compensatory Habitat: Permittee, in consultation with CDFW, will develop a biological report for any proposed compensatory habitat as part of the HMLA Stage 1 – Property Eligibility process and provide details regarding baseline conditions of the habitat, target resources (e.g., off-channel rearing and wetland bench habitat, etc.) and how the Covered Species would benefit from conservation of the proposed property. Permittee shall incorporate into the biological report, a rearing habitat value index to demonstrate how the proposed compensatory habitat, or associated restoration projects proposed for compensatory mitigation meet the full mitigation standard of CESA. Permittee shall include the following as part of the rearing habitat value index for a proposed property:	ITP Condition # 10	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
	 Area of habitat (acres) Suitability of habitat for rearing juvenile salmonids Location and accessibility to juvenile salmonids (CHNWR and CHNSR) Timing of habitat inundation in relation to presence of juvenile CHNWR and juvenile CHNSR Frequency of habitat inundation Habitat complexity 				
	Permittee shall develop and submit a Chinook Salmon Habitat Restoration Plan (CHSHRP) as part of the HMLA Stage 1 – Property Eligibility process. CDFW shall respond for comment and approval within one year of submission. Permittee shall demonstrate the following information for proposed property as part of the CHSHRP for the HMLA Stage 1 – Property Eligibility process:				
	 Location of the proposed property shall occur within the Sacramento River between Hamilton City and the confluence with the Feather River. Juvenile salmonids have the potential to volitionally access the rearing habitat from the Sacramento River and volitionally return to the Sacramento River. A minimum of twenty-five percent of total habitat acreage provides suitable rearing habitat for juvenile Chinook Salmon at flows of 10,930 cfs at the Sacramento River at Wilkin's Slough. Corresponding minimum flow requirements in the Sacramento River reach encompassing the constructed rearing habitat shall be determined through routed flow modeling, in consultation with CDFW. The percentage of total habitat providing suitable rearing habitat should increase with increasing 				
	Wilkins Slough flow; one hundred percent of the habitat should provide suitable rearing habitat at Wilkins Slough flows greater than 30,000 cfs.				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
Ş	White Sturgeon Spawning Area Supplementation Program. Permittee shall develop a White Sturgeon Spawning Area Supplementation Program (WSSASP) to provide spawning area supplementation of gravel to boulder sized substrate with the potential to improve egg survival in areas of known WS spawning for impacts from Project operations from increased sediment load and sub-optimal substrate resulting in increased egg mortality. Permittee shall coordinate with CDFW and DWR within six months of issuance of the ITP, to be included as a potential partner for DWR's initial scoping process to identify and evaluate potential habitat restoration sites within the Sacramento and San Joaquin River for WSSASP Projects. Permittee shall within one year of publishing of DWR's final report on spawning area supplementation (as specified in Amendment No. 9 – ITP No. 2081-2019-066-00; Condition of Approval 9.6) identify restoration project(s) for implementation identified in DWR's final report. Permittee shall submit a draft WSSASP plan to CDFW for review within four years of issuance of the ITP that shall outline the scope, cost and timeline of the supplementation project(s) for the Permittee to participate in, as well as a monitoring and reporting program for the effectiveness of the proposed restoration project(s) once construction is complete. Reference Table 5 of the ITP for cost estimates related to the WSSASP. Permittee shall incorporate comments from CDFW and submit the final WSSASP plan for CDFW's approval (in-writing) within five years of issuance of the ITP. Permittee shall initiate the project(s) within eight years of issuance of the ITP, or provide Security as specified in Condition of Approval 11.1 (Security Amount) and initiate the WSSASP by December 31 of the final term year, as specified in the ITP. Permittee will provide for the acquisition, protection, and management of HM Lands for the WSSASP as described in Condition of Approval 10.5, or other mechanism of protection, approved in advance by CDFW (in-writing, this may s	ITP Condition # 10.1	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
10	Permittee Responsible Mitigation. Permittee shall provide annual updates in the ASR Condition of Approval 8.3 (Annual Status Report) on the mechanism(s) of compensatory mitigation for Permittee responsible mitigation for the Covered Species (CDFW-approved mitigation or conservation banks; or HM Lands), projected timelines to finalize Permittee responsible mitigation requirements, potential land parcels for compensatory habitat, or status updates on applicable CDFW-approved mitigation or conservation banks, and subsequent status reports towards completion of Security requirements and applicable HM Lands documentation. Permittee shall also provide the information required in Condition of Approval 10 (Longfin Smelt and Delta Smelt Compensatory Habitat; Winter-Run and Spring-Run Chinook Salmon Dual or Stacked Compensatory Habitat; Winter-Run and Spring-Run Chinook Salmon Compensatory Habitat). Permittee shall also include the status on the overall progress of the elements identified in the Permittee responsible mitigation timeline described below. Permittee Responsible Mitigation Timeline. Permittee shall complete the following requirements within the specified timeframes by December 31 for each requirement and include the updated status information in the subsequent ASR (Condition of Approval 8.3 – Annual Status Report): Within two years (by December 31) of the issuance of the ITP, Permittee shall provide a minimum Security in the amount of \$15,000,000.00 as specified in Condition 11 below. Within eight years (by December 31) of issuance of the ITP, Permittee shall submit a copy of the Bill of Sale(s) and Payment Receipt for credits from a CDFW-approved mitigation or conservation bank, Or Permittee shall provide Security for all outstanding obligations as described below, within the same year. Within eight years (by December 31) of issuance of the ITP, Permittee shall submit all requested HM Lands documentation described in Stage 2 of the Habitat Management Lands Acquisition (HMLA) process for Property Accepta	ITP Condition # 10.2 and 10.2.1	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
	Amendment to the requirements outlined above may be authorized in consultation with CDFW as specified in Section 6 of the ITP.				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
11	Cost Estimates. For the purposes of determining the Security amount, CDFW has estimated the cost sufficient for CDFW or its contractors to complete acquisition, protection, and perpetual management of the HM lands as follows: Land acquisition costs for HM lands identified in Condition of Approval 10.5 below, estimated as specified in Table 5 of the ITP. Land acquisitions costs are estimated using local fair market current value per acre for lands with habitat values meeting mitigation requirements; All other costs necessary to review and acquire the land in fee title and record a conservation easement as described in Condition of Approval 10.5.1 and 10.5.2 below: \$3,577,752.00. Start-up costs for HM lands, including initial site protection and enhancement costs as described in Condition of Approval 10.5.7 below, estimated at \$30,360,924.00; including. Interim management period funding as described in Condition of Approval 10.5.8 below, estimated at \$161,320.00; Long-term management funding as described in Condition of Approval 10.6 below, estimated at \$9,356.68/acre for 378.4 acres: \$3,540,571.00 Long-term management funding is estimated initially for the purpose of providing Security to ensure implementation of HM lands management.	ITP Condition #10.3, 10.3.1, 10.3.2, 10.3.3, 10.3.4, 10.3.5, 10.3.6, 10.3.7, and 10.3.8	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
	Related transaction fees including but not limited to account set-up fees, administrative fees, title and documentation review and related title transactions, expenses incurred from other state agency reviews, and overhead related to transfer of HM lands to CDFW as described in Condition of Approval 10.7, estimated at \$6,000.00. Related transaction fees are applicable to \$3,000.00 of the initial \$15,000,000.00 security specified in Condition 11 and \$3,000.00 for the subsequent account setup for the remainder of the Permittee compensatory habitat and Security as it relates to transaction and administrative fees incurred from other state agency reviews. Covered Species monitoring, estimated by the Permittee at \$1,000,000.00 per year over a period of fifteen years; estimated at \$15,000,000.00. All costs associated with CDFW engaging an outside contractor to complete the mitigation tasks, including but not limited to acquisition, protection, and perpetual funding and management of the HM lands and restoration of temporarily disturbed habitat. These costs include but are not limited to the cost of issuing a request for proposals, transaction costs, contract administration costs, and costs associated with monitoring the contractor's work \$1,708,703.00.				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
12	Covered Species Credits. If the Permittee elects to purchase Covered Species credits to complete compensatory mitigation obligations, then Permittee shall purchase 378.4 acres (All Covered Species – See Table 5 of the ITP) (or 195.8 acres – All Covered Species, if dual or stacked CHNWR and CHNSR credit are approved by CDFW – See Table 5 of the ITP) of Covered Species credits from a CDFW-approved mitigation or conservation bank, as specified in Table 5 of the ITP and Section 10 above, within eight years (by December 31) of issuance of the ITP and submit to CDFW a copy of the Bill of Sale(s) and Payment Receipt. Permittee shall within eight years of issuance of the ITP provide Security pursuant to Condition 11 below for Covered Species credits, if a copy of the Bill of Sale(s) and Payment Receipt for credits from a CDFW-approved mitigation or conservation bank are not provided. Prior to purchase of Covered Species credits, Permittee shall obtain CDFW approval to ensure the mitigation or conservation bank is appropriate to compensate for the impacts of the Project. Permittee shall submit to CDFW a copy of the Bill of Sale(s) and Payment Receipt by December 31 of the final term year, as specified in the ITP, if Security is provided.	ITP Condition #10.4	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	

13	Habitat Management Lands Acquisition and Protection. If the Permittee elects to provide for the acquisition, permanent protection, and perpetual management of HM lands to complete compensatory mitigation obligations, then the Permittee shall: Fee Title. Transfer fee title of the HM lands to CDFW pursuant to terms approved in writing by CDFW. Alternatively, CDFW, in its sole discretion, may authorize a governmental entity, special district, non-profit organization, for-profit entity, person, or another entity to hold title to and manage the property provided that the district, organization, entity, or person meets the requirements of Government Code sections 65965-65968, as amended.	ITP Condition #10.5, 10.5.1, 10.5.2, 10.5.3, 10.5.4, 10.5.5, 10.5.6, 10.5.7, and 10.5.8	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
	Conservation Easement. If CDFW does not hold fee title to the HM lands, CDFW shall act as grantee for a conservation easement over the HM lands or shall, in its sole discretion, approve a non-profit entity, public agency, or Native American tribe to act as grantee for a conservation easement over the HM lands provided that the entity, agency, or tribe meets the requirements of Civil Code section 815.3. If CDFW elects not to be named as the grantee for the conservation easement, CDFW shall be expressly named in the conservation easement as a third-party beneficiary. The Permittee shall obtain CDFW written approval of any conservation easement before its execution or recordation. No conservation easement shall be approved by CDFW unless it complies with Civil Code sections 815-816, as amended, and Government Code sections 65965-65968, as amended and includes provisions expressly addressing Government Code sections 65966(j) and 65967(e). Because the "doctrine of merger" could invalidate the conservation interest, under no circumstances can the fee title owner of the HM lands serve as grantee for the conservation easement.				
	HM Lands Property Eligibility Review. Permittee shall obtain CDFW written approval of the proposed HM lands before acquisition and/or transfer of the land by submitting to CDFW for approval the documents included in HMLA Stage 1 – Property Eligibility, identifying the proposed land to be purchased or property interest conveyed to an approved entity as mitigation for the Project's impacts on Covered Species;				
	Land Manager. Permittee shall propose an interim land manager and long-term land manager for approval by CDFW. The interim fand long-term land managers may, but need not, be the same entity. The interim and/or long-term land managers may be the landowner or another party. Permittee shall ensure documents related to land management shall identify both the interim and long-term land managers. Permittee shall notify CDFW of any subsequent changes in the land manager at least thirty days prior to the proposed change. The grantee for the conservation easement cannot serve as the interim or long-term manager without the express written authorization of CDFW.				
	HM Lands CDFW Property Acceptance. After CDFW has determined the proposed property is eligible to meet the mitigation requirements for the Project's impacts on Covered Species (see HM Lands Property Eligibility Review), Permittee shall provide any updates and additional documents requested by CDFW as part of HMLA Stage 2 – Property Acceptance.				
	<u>Digital Closing Package</u> . After CDFW has accepted the proposed property as mitigation for the project's impacts on Covered Species (see HM Lands CDFW Property Acceptance), Permittee shall provide CDFW with a digital closing package. The digital closing package shall include a copy of the title insurance policy, settlement/closing statement, recorded grant deed or conservation easement deed,				

Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
and all other documents recorded at closing as described in HMLA Stage 3 – <u>Property Protection and Closing Documentation</u> .				
Start-up Activities. Permittee shall provide for the implementation of start-up activities, including the initial site protection and enhancement of HM lands, once the HM lands have been accepted by CDFW. Start-up activities include, at a minimum: (1) submitting a final management plan for CDFW approval (2) conducting a baseline biological assessment and land survey report within four months of recording or transfer; (3) developing and transferring Geographic Information Systems (GIS) data if applicable; (4) establishing initial fencing; (5) conducting litter removal; (6) conducting initial habitat restoration or enhancement, if applicable; and (7) installing signage;				
Interim Management (Initial and Capital). Permittee shall provide for the interim management of the HM lands. The Permittee shall ensure that the interim land manager implements the interim management of the HM lands as described in the final management plan and conservation easement approved by CDFW. The interim management period shall be a minimum of three years from the date of HM land acquisition and protection and full funding of the Endowment and includes expected management following start-up activities. Interim management period activities described in the final management plan shall include fence repair, continuing trash removal, site monitoring, and vegetation and invasive species management.				
Permittee shall either (1) provide Security to CDFW for the minimum of three years of interim management that the land owner, Permittee, or land manager agrees to manage and pay for at their own expense, (2) establish an escrow account with written instructions approved in advance in writing by CDFW to pay the land manager annually in advance, or (3) establish a short-term enhancement account with CDFW or a CDFW-approved entity for payment to the land manager.				

Endowness Fund 16th a Describe a place to previde for the conscience program of the control of t			1	1
Endowment Fund. If the Permittee elects to provide for the acquisition, permanent protection, and perpetual management of HM lands to complete compensatory mitigation obligations, then the Permittee shall ensure that the HM lands are perpetually managed, maintained, and monitored by the long-term land manager as described in the ITP, the conservation easement, and the final management plan approved by CDFW. After obtaining CDFW approval of the HM lands, Permittee shall provide long-term management funding for the perpetual management of the HM lands by establishing a long-term management fund (Endowment). The Endowment is a sum of money, held in a CDFW-approved fund that is permanently restricted to paying the costs of long-term management and stewardship of the mitigation property for which the funds were set aside, which costs include the perpetual management, maintenance, monitoring, and other activities on the HM lands consistent with the ITP, the conservation easement, and the management plan required by Condition of Approval 10.6.5. Endowment as used in the ITP shall refer to the endowment deposit and all interest, dividends, other earnings, additions and appreciation thereon. The Endowment shall be governed by the ITP, Government Code sections 65965-65968, as amended, and Probate Code sections 18501-18510, as amended. After the interim management period, Permittee shall ensure that the designated long-term land manager implements the management and monitoring of the HM lands according to the final	ITP Condition #10.6, 10.6.1, 10.6.2, 10.6.2.1, 10.6.2.2, 10.6.2.2.3, and 10.6.4	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
management plan. The long-term land manager shall be obligated to manage and monitor the HM lands in perpetuity to preserve their conservation values in accordance with the ITP, the conservation easement, and the final management plan. Such activities shall be funded through the Endowment.				
Identify an Endowment Manager. The Endowment shall be held by the Endowment Manager, which shall be either CDFW or another entity qualified pursuant to Government Code sections 65965-65968, as amended.				
Permittee shall submit to CDFW a written proposal that includes: (i) the name of the proposed Endowment Manager; (ii) whether the proposed Endowment Manager is a governmental entity, special district, nonprofit organization, community foundation, or congressionally chartered foundation; (iii) whether the proposed Endowment Manager holds the property or an interest in the property for conservation purposes as required by Government Code section 65968(b)(1) or, in the alternative, the basis for finding that the Project qualifies for an exception pursuant to Government Code section 65968(b)(2); and (iv) a copy of the proposed Endowment Manager's certification pursuant to Government Code section 65968(e).				
Within thirty days of CDFW's receipt of Permittee's written proposal, CDFW shall inform Permittee in writing if it determines the proposal does not satisfy the requirements of Fish and Game Code section 2081(b)(3) and, if so, shall provide Permittee with a written explanation of the reasons for its determination. If CDFW does not provide Permittee with a written determination within the thirty-day period, the proposal shall be deemed consistent with Section 2081(b)(3).				
Calculate the Endowment Funds Deposit. After obtaining CDFW written approval of the HM lands, long-term management plan, and Endowment Manager, Permittee shall submit to CDFW an endowment assessment (equivalent to a Property Analysis Record (PAR)) to calculate the amount of funding necessary to ensure the long-term management of the HM lands (Endowment Deposit Amount). Note that the endowment for the easement holder should not be included in this calculation. The Permittee shall submit to CDFW for review and approval the results of the endowment assessment before transferring funds to the Endowment Manager. Capitalization Rate and Fees. Permittee shall obtain the				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
	capitalization rate from the selected Endowment Manager for use in calculating the endowment assessment and adjust for any additional administrative, periodic, or annual fees.				
	<u>Endowment Buffers/Assumptions</u> . Permittee shall include in the endowment assessment assumptions the following buffers for endowment establishment and use that will substantially ensure long-term viability and security of the Endowment:				
	10 Percent Contingency. A ten percent contingency shall be added to each endowment calculation to hedge against underestimation of the fund, unanticipated expenditures, inflation, or catastrophic events.				
	Three Years Delayed Spending. The endowment shall be established assuming spending will not occur for the first three years after full funding.				
	Non-annualized Expenses. For all large capital expenses to occur periodically but not annually such as fence replacement or well replacement, payments shall be withheld from the annual disbursement until the year of anticipated need or upon request to Endowment Manager and CDFW.				
	<u>Transfer Long-term Endowment Funds</u> . Permittee shall transfer the long-term endowment funds to the Endowment Manager upon CDFW approval of the Endowment Deposit Amount identified above.				
	Management of the Endowment. The approved Endowment Manager may pool the Endowment with other endowments for the operation, management, and protection of HM lands for local populations of the Covered Species but shall maintain separate accounting for each Endowment. The Endowment Manager shall, at all times, hold and manage the Endowment in compliance with the ITP, Government Code sections 65965-65968, as amended, and Probate Code sections 18501-18510, as amended.				
	Notwithstanding Probate Code sections 18501-18510, the Endowment Manager shall not make any disbursement from the Endowment that will result in expenditure of any portion of the principal of the endowment without the prior written approval of CDFW in its sole discretion. Permittee shall ensure that this requirement is included in any agreement of any kind governing the holding, investment, management, and/or disbursement of the Endowment funds. Notwithstanding Probate Code sections 18501-18510, if CDFW determines in its sole discretion that an expenditure needs to be made from the Endowment to preserve the conservation values of the HM lands, the Endowment Manager shall process that expenditure in accordance with directions from CDFW. The Endowment Manager shall not be liable for any shortfall in the Endowment resulting from				
15	CDFW's decision to make such an expenditure. Reimburse CDFW. Permittee shall reimburse CDFW for all reasonable costs incurred by CDFW related to issuance and monitoring of the ITP, including, but not limited to transaction fees, account set-up fees, administrative fees, title and documentation review and related title transactions, costs incurred from other state agency reviews, and overhead related to transfer of HM lands to CDFW.	ITP Condition #10.7	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
16	Permittee shall provide Security as follows: Security Amount. Permittee shall provide an initial Security within two years (by December 31) of the effective date of the ITP in the amount of \$15,000,000.00 in the Security form specified below, related to Covered Species monitoring. This amount is determined based on the estimate provided by the Permittee for Covered Species monitoring.	ITP Condition #11, 11.1, and 11.1.1	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
	Permittee shall provide additional Security within eight years (by December 31) of permit issuance, in the amount of \$115,085,470.00 (total security of \$130,085,470.00; including initial \$15,000,000.00) or in the amount specific to the obligation that has not been completed. This amount is determined by CDFW based on the cost estimates identified in Condition of Approval 10.3 above, and provided by the Permittee estimates identified in Table 5 of the ITP, sufficient for CDFW or its contractors to complete land acquisition, property enhancement, startup costs, initial management, long-term management, and monitoring. Permittee may upon CDFW review and approval (in writing) be authorized to reduce compensatory habitat and Security, as specified below.				
	Reduced Security for Dual or Stacked Salmonid Species Habitat Types. Permittee may be authorized by CDFW (in writing) to reduce Permittee responsible mitigation and associated Security identified in Condition 10 (Winter-Run and Spring-Run Chinook Salmon Dual or Stacked Compensatory Habitat) and Condition 11.1 to \$72,542,735.00. Permittee shall within eight years (by December 31) of the effective date of the ITP, provide sufficient biological evidence, as determined by CDFW, employing the concepts described in Condition 10 of the ITP (Winter-Run and Spring-Run Chinook Salmon Compensatory Habitat) the proposed compensatory habitat supports both CHNWR and CHNSR. Permittee may only apply the dual or stacked habitat types to the CHNWR and CHNSR riparian off channel rearing habitat and riparian wetland bench habitat types, as specified in Table 5 of the ITP.				
17	Security Form. The Security shall be in the form of an irrevocable letter of credit (see Attachment 3), or another form of Security approved in advance in writing by CDFW.	ITP Conditions #11.2	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
18	Security Timeline. The initial Security shall be provided to CDFW within two years (by December 31) of the effective date of the ITP for the Security amount of \$15,000,000.00 in the Security form specified above, for Covered Species Monitoring. Permittee shall provide within eight years (by December 31) of the effective date of the ITP, Security in the total amount of \$130,085,470.00, for all outstanding compensatory mitigation obligations, as specified in Condition of Approval 10 and 11.1.1, the total Security may be adjusted (may be subject to amendment) based on outstanding and completed compensatory mitigation obligations.	ITP Conditions #11.3	Prior to the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
19	Security Holder. The Security shall be held by CDFW or in a manner approved in advance in writing by CDFW.	ITP Conditions #11.4	Prior to the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
20	Security Transmittal. Permittee shall transmit the Security to CDFW with a completed Mitigation Payment Transmittal Form (see Attachment 4) or by way of an approved instrument such as an escrow agreement, irrevocable letter of credit, or other.	ITP Conditions #11.5	Prior to the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
21	Security Drawing. The Security shall allow CDFW to draw on the principal sum if CDFW, in its sole discretion, determines that the Permittee has failed to comply with the Conditions of Approval of the ITP.	ITP Conditions #11.6	Prior to the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
22	Security Release. The Security (or any portion of the Security then remaining) shall be released to the Permittee after CDFW has conducted an on-site inspection and received confirmation that all secured requirements have been satisfied, as evidenced by: Credit Purchase Copy of Bill of Sale(s) and Payment Receipt(s) or Credit Transfer Agreement for the purchase of Covered Species credits; and Timely submission of all required reports. Habitat Management Land Acquisition (HMLA) Written documentation of the acquisition of the HM lands; Copies of all executed and recorded conservation easements; Written confirmation from the approved Endowment Manager of its receipt of the full Endowment; And; Timely submission of all required reports. Even if Security is provided, the Permittee must complete the required acquisition, protection and transfer of all HM lands and record any required conservation easements as specified in Condition 10 and 11 of the ITP. CDFW may require the Permittee to provide additional HM lands and/or additional funding to ensure the impacts of the taking are minimized and fully mitigated, as required by law, if the Permittee does not complete these requirements within the specified timeframe.	ITP Conditions #11.7	Before the initiation of Covered Activities, or prior to the initiation of Operations as specified in Conditions 10 (HM Lands) and 11 (Security)	Permittee	
-	VERED SPECIES MONITORING AND SCIENCE REQUIREMENTS	1	T	T	Т
23	Winter-Run and Spring-Run Chinook Salmon Monitoring and Science Requirements. To improve understanding of CHNWR and CHNSR population size, life history diversity, migration patterns, survival rates, habitat use, and impacts from Project-operations related stressors, Permittee shall fund, initiate, and implement Covered Species monitoring programs and science requirements. This new monitoring and science shall incorporate the elements identified in the Conditions of Approval 8.7.1, 8.7.2, 8.7.3, 8.7.4, 8.7.5, 8.7.6, and 8.7.7, and shall be combined with existing surveys and data to: 1) continue to build knowledge regarding the biology and life history of Covered Species; 2) better understand potential impacts of Covered Activities on Covered Species; 3) inform whether refinements or modifications to the Project's operational criteria have the potential to further minimize impacts to Covered Species.	ITP Condition #8.7	Prior to and During Operations	Permittee	

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Juvenile Salmonid Survival Study Program. Permittee shall prepare and implement a Juvenile Salmon Survival Study Program (JSSSP) to improve the understanding of the effects of Project operations on juvenile CHNWR and CHNSR survival near the fish screens during times when juvenile salmon are naturally present. The draft plan for the JSSSP shall be submitted to CDFW for review within three years of the issuance of the ITP. Permittee shall incorporate comments from CDFW and submit the final JSSSP plan for CDFW's approval (in writing) within four years of the issuance of the ITP. Permittee shall conduct the required JSSSP studies before initiation of Project operations (within six years of issuance of the ITP) to characterize baseline conditions during the main period of natural fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through March of the first year of Project operations while the Project is actively diverting. Permittee shall submit the pre- and post-operation reports within ninety days of study completion. The format and data reporting requirements of the reports shall be determined in consultation with CDFW during the JSSSP submission and approval process. The study plan shall include the following:	ITP Condition #8.7.1	Prior to and During Operations	Permittee	
 A schedule for implementation, including deadlines for draft and final reports. A data management plan. 				
 A plan to characterize the effects of Project diversions, relative to baseline conditions, on overall juvenile CHNWR and CHNSR survival and mortality in the immediate areas of the fish screens, including through the HCPS oxbow channel. This plan shall include: 				
 Quantification and characterization of trends in mortality due to impingement on the RBPP fish screen and HCPS fish screen during the main period of fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through March of the first year of Project operations while the Project is actively diverting. 				
Quantification and characterization of mortality due to predation in the immediate area of the RBPP fish screen and HCPS fish screen, as compared to elsewhere in the Sacramento River (may be conducted in conjunction with Condition of Approval 8.7.2 – Predator Study Program), during the main period of fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through March of the first year of				
Project operations while the Project is actively diverting. Quantification and characterization of trends in mortality due to predation throughout the entire HCPS oxbow channel, especially in the spill area immediately downstream of the flow control weir, and the length and breadth of the HCPS oxbow channel outflow (may be conducted in conjunction with Condition of Approval 8.7.2 – Predator Study Program). Predation rates shall be compared to predation rates elsewhere in the Sacramento River, during the main period of fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through march of the first year of Project operations while the				
Project is actively diverting. O Quantification of survival along the full HCPS oxbow channel inlet to the outlet during the main period of fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through March of the first year of Project operations while the Project is actively diverting.				
 Quantification and characterization of juvenile Chinook salmon usage of the RBPP fish screen fish refuge areas during the main period of fish presence near the diversion facilities of 				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
	October through March when no diversions are occurring, and during October through March of the first year of Project operations while the Project is actively diverting.				
25	Predator Study Program. Permittee shall prepare a Predator Study Program (PSP) to evaluate predator fish densities, spatiotemporal (seasonal) distributions and predator diets in the immediate vicinity of the RBPP and HCPS fish screens and throughout the HCPS oxbow channel, as compared to control sites in the Sacramento River. The purpose of the PSP is to provide a more in-depth understanding of the potential effects of predation caused by Project operations at the RBPP and HCPS diversion facilities on CHNWR and CHNSR. Permittee shall submit the draft PSP plan to CDFW for review within three years of the issuance of the ITP. Permittee shall incorporate comments from CDFW and submit the final PSP for CDFW's approval (in writing) within four years of the issuance of the ITP. Permittee shall conduct the predator studies before initiation of Project operations (within six years of issuance of the ITP) to collect baseline data during the main period of natural fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through March of the first year of Project operations while the Project is actively diverting. Permittee shall develop a survey protocol in consultation with CDFW as part of the plan submission process to determine survey equipment, methods and analysis, as well as a project implementation schedule and data report format. All pre- and post-study reports shall be submitted within ninety days of completion of the study to CDFW. The PSP shall include, but shall not be limited to:	ITP Condition #8.7.2	Prior to and During Operations	Permittee	
	 A schedule for implementation, including deadlines for draft and final reports. A data management plan. Predator surveys concurrent with Juvenile Salmonid Survival Study Program (Condition of Approval 8.7.1) to estimate the proportion of juvenile salmonid mortality attributable to predation near the fish screens during the main period of natural fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through March of the first year of Project operations while the Project is actively diverting. Predator surveys throughout the year to characterize spatio-temporal (seasonal) patterns in predator densities and distributions near the fish screens during the main period of natural fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through March of the first year of Project operations while the Project is actively diverting. Live capture and gastric lavage of predator fish during predator surveys to evaluate predator diets near the fish screens during the main period of natural fish presence near the diversion facilities of October through March when no diversions are occurring, and during October through March of the first year of Project operations while the Project is actively diverting. 				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
26	Long-Term Salmonid Monitoring Program in the Hamilton City Oxbow Channel. Permittee shall prepare a Fish Monitoring Program (FMP) for the continuous, long-term rotary screw trap monitoring of juvenile salmonid passage (CHNWR, CHNSR) through the HCPS oxbow channel. The purpose of the monitoring is to estimate juvenile passage through the oxbow channel at HCPS diversion facility and estimate exposure to the HCPS fish screen during the Project diversion window of September 1 through June 14. Permittee shall submit the FMP draft plan to CDFW for review within one year of the issuance of the ITP. Permittee shall incorporate comments from CDFW and submit the final FMP for CDFW's approval (in writing) within two years of the issuance of the ITP. Long-term monitoring shall commence within three years of the issuance of the ITP and shall continue for the full term of the ITP. Permittee shall consult with CDFW during development of the FMP regarding the appropriate methods of analysis to estimate screen exposure of salmonids. In addition to quantifying juvenile salmonid passage through the HCPS oxbow channel, the long-term monitoring plan shall also include development and implementation of permanent juvenile salmon acoustic telemetry systems (JSATS) receiver arrays (all arrays shall be composed of two receivers on opposite sides of the channel) in the following two areas, with specific locations to be determined in consultation with CDFW: • In the HCPS oxbow channel, upstream of the HCPS fish screen. • In the HCPS oxbow channel outflow, between the flow control weir and the confluence. JSATS receiver arrays shall be deployed during the Project diversion window of September 1 through June 14, at a minimum. Permittee shall provide reports for long-term monitoring at a schedule and frequency identified in the draft FMP for the term of the ITP. The schedule, frequency, format and reporting structure, and receiver array maintenance schedule shall be determined in consultation with CDFW during the FMP submission and approva	ITP Condition #8.7.3	Prior to and During Operations	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
27	Juvenile Salmonid Sutter Bypass Entrainment and Survival Program. Permittee shall develop a Juvenile Salmonid Sutter Bypass Entrainment and Survival Program (JSSBESP). The JSSBESP shall be designed to inform the understanding of juvenile salmonid migration routing and survival in the Sacramento River and the potential impacts the Project operations may have on routing and survival of juvenile salmonids. The JSSBESP shall also further inform the effects Project operations have on the potential to influence entrainment of salmonids by influencing the flow overtopping at weirs within the Sutter Bypass in regard to the duration (number of days) and volume of water during the Project diversion window of September 1 through June 14. The JSSBESP may also improve the understanding of migration survival due to changes in entrainment probability potentially resulting from Project operations. Permittee shall, in consultation with CDFW, develop a draft plan to deploy JSAT receivers in the Sutter Bypass at the Moulton, Colusa and Tisdale weirs, as well as strategic locations within the bypass. Permittee shall submit all JSAT deployment locations for review and approval by CDFW (inwriting) as part of the draft plan submission process. The JSAT receivers shall be strategically deployed to maximize detection probability at the river junctions with each weir that spills into the Sutter Bypass (i.e. Moulton, Colusa, and Tisdale weirs). An extensive existing array of JSATS receivers is deployed each year throughout the Sacramento River system by a collaborative team of institutions that shall be incorporated into the analysis for this study.	ITP Condition #8.7.4	Prior to and During Operations	Permittee	
	Permittee shall submit the draft study plan within two years of issuance of the ITP. Permittee shall incorporate comments from CDFW and submit the final plan for CDFW's approval (in-writing) within three years of the issuance of the ITP. The JSSBESP based on the final study plan shall be initiated within four years of issuance of the ITP and continue for the term of the ITP. Permittee shall maintain all associated equipment in working condition for the term of the ITP. Permittee shall submit reports at a schedule and frequency identified in the final CDFW-approved plan for the term of the ITP. The report format and reporting requirements shall also be determined in consultation with CDFW during the plan submission and approval process. All data shall be made open source and available in the following format (Environmental Data Initiative [EDI] Data Portal repository) in consultation with CDFW. Permittee shall continue the data reporting for the term of the ITP.				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
28	Pre-Smolt Juvenile Survival Program. Permittee shall develop a Pre-Smolt Juvenile Survival Program (PSJSP) to provide an improved understanding of potential Project impacts to migratory survival of smaller size classes of juvenile salmonids (45-80 mm fork length) that may occur from Covered Activities. The PSJSP be used to inform and quantify any degree of difference in migration survival between fish larger than 80 mm and fish between 45-80 mm fork length. Permittee shall develop an analysis to evaluate the survival estimate for fish smaller than 80 mm fork length. Permittee may employ multiple methodologies including existing monitoring efforts (such as rotary screw traps) in consultation with CDFW. A draft study plan shall be submitted within four years of issuance of the ITP that includes detailed information on the study using the principles outlined in this section. Permittee shall incorporate comments from CDFW and submit the final plan for CDFW's approval (in-writing) within five years of the issuance of the ITP. The PSJSP based on the final study shall be initiated within six years of issuance of the ITP and continue for the term of the ITP. All data shall be made open source and available in the following format (Environmental Data Initiative [EDI] Data Portal repository) in consultation with CDFW. Permittee shall develop new monitoring sites, or utilize existing monitoring sites, in the following locations:	ITP Condition #8.7.5	Prior to and During Operations	Permittee	
	 <u>Location 1</u>. Red Bluff, River Mile (RM) ~ 242 in the approximate area of the Red Bluff Rotary Screw Trap in the Sacramento River. <u>Location 2</u>. Sacramento, RM ~ 75 in the lower boundary of the reach in the approximate area of the Sacramento River near Delta Entry Rotary Screw Trap. 				
29	Spring-Run Chinook Salmon Life Cycle Model. Upon availability of the Spring-Run Life Cycle Model (SRLCM), currently in development as required by ITP No. 2081-2019-066-00, Permittee shall use best available science, as approved by CDFW, to analyze effects of proposed operations and the proposed use of Reclamation's investment in Sites and requirements from any subsequent permits on CHNSR. Permittee shall develop model inputs that consider and include, as determined in consultation with CDFW, the results of science actions described in Conditions of Approval 8.7.1, 8.7.2, 8.7.3, 8.7.4, and 8.7.5, when such data is available. Permittee shall, in coordination with CDFW, verify the quantification of Project impacts from the SRLCM to CHNSR and consult with CDFW about potential amendments to the ITP, if warranted.	ITP Condition #8.7.6	Prior to Operations	Permittee	

30	Protection of the Yolo Bypass Salmonid Habitat Restoration and Fish Passage Project Objectives.	ITP Condition	Prior to and During Operations	Permittee	
	Permittee shall develop, in coordination with DWR and Reclamation, a study plan within seven years of issuance of the ITP to CDFW that provides methods to analyze if Project operations have the potential	#8.7.7	3 4 4 4 4		
	to diminish the ability of Salmonid Habitat Restoration and Fish Passage Project to achieve its goals and				
	objectives, as described below. The draft plan shall be submitted for CDFW review within five years of				
	ITP issuance and the final plan shall be submitted for CDFW approval (in writing) within seven years of ITP issuance. After initiation of Project operations, if the Project operates in a manner that diminishes				
	the ability of the Salmonid Habitat Restoration and Fish Passage Project to achieve its goals and				
	objectives, the Permittee shall, in coordination with DWR and Reclamation, develop a plan to minimize and mitigate, as applicable, this impact. Permittee shall submit the minimization and mitigation plan to				
	CDFW in draft form for review and Permittee shall obtain CDFW's written approval prior to its				
	implementation. The study plan and subsequent analysis may also be used to inform any potential				
	consideration of refinement to the ITP's minimization and mitigation of Covered Activities' impacts to juvenile rearing habitat in the Yolo Bypass. The goals and objectives of the Salmonid Habitat				
	Restoration and Fish Passage Project are as follows:				
	The first objective is to increase the availability of fleedalain reasing behitst for invenile CUNIA/D				
	The first objective is to increase the availability of floodplain rearing habitat for juvenile CHNWR, CHNSR, and Central Valley steelhead. This action can also improve conditions for Sacramento splittail				
	and Central Valley fall-run Chinook salmon. Specific biological goals include:				
	Improve access to seasonal habitat through volitional entry				
	 Increase access to and acreage of seasonal floodplain fisheries rearing habitat 				
	Reduce stranding and presence of migration barriers				
	 Increase aquatic primary and secondary biotic production to provide food through an ecosystem approach 				
	The second objective is to reduce migratory delays and loss of fish at Fremont Weir and other				
	structures in the Yolo Bypass. Specific biological goals include:				
	Improve connectivity within the Yolo Bypass for passage of salmonids and sturgeon.				
	2. Improve connectivity between the Sacramento River and the Yolo Bypass to provide safe and				
	timely passage for:				
	 Adult CHNWR between mid-November and mid-March when water surface elevations in the 				
	Sacramento River are amenable to fish passage O Adult CHNSR between January and May when elevations in the Sacramento River are				
	amenable to fish passage				
	 Adult California Central Valley steelhead in the event their presence overlaps with the defined seasonal window for other target species when elevations in the Sacramento River are 				
	amenable to fish passage				
	 Adult Southern DPS green sturgeon between February and May when elevations in the 				
	Sacramento River are amenable to fish passage. O Adult WS between February and mid-March when elevations in the Sacramento River are				
	amenable to fish passage.				
	The Salmonid Habitat Restoration and Fish Passage Project includes the construction of a new gated				
	notch in Fremont Weir located in the northern Yolo Bypass and channel that parallels the existing east				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
	levee of the Yolo Bypass. The gated notch and channel have the ability to convey flows up to 6,000 cfs, depending on the Sacramento River, to provide open channel flow for adult fish passage, juvenile fish emigration, and floodplain inundation. This alternative also includes a supplemental fish passage facility on the west side of Fremont Weir and improvements to allow fish to pass through Agricultural Road Crossing 1 and the channel north of Agricultural Road Crossing 1.				
	DWR will implement the Salmonid Habitat Restoration and Fish Passage Project in accordance with its adaptive management and monitoring plan, and any subsequent revisions.				
31	White Sturgeon Monitoring and Science Requirements. To improve understanding of WS impacts from Project-operations related stressors, Permittee shall fund, initiate, and implement WS monitoring programs and science requirements. This new monitoring and science shall incorporate the elements identified in the Conditions of Approval 8.8.1, 8.8.2, 8.8.3, and 8.8.4, and shall be combined with existing surveys and data to: 1) continue to build knowledge regarding the biology and life history of Covered Species; 2) better understand potential impacts of Covered Activities on Covered Species; 3) inform consideration of whether refinements to operational criteria that have the potential to further minimize impacts to Covered Species.	ITP Condition #8.8	Prior to and During Operations	Permittee	
32	Juvenile White Sturgeon Survival Program. Permittee shall develop a juvenile WS Survival Study Program (WSSP) to improve the understanding of the effects of Project diversions on juvenile WS survival near the HCPS fish screens. The WSSP shall be designed to further inform on the effects of Project diversions on WS survival and mortality in the immediate areas of the fish screens and characterize trends in mortality due to entrainment of larval and juvenile WS, 30 mm or less during the period of January 1 through June 14. Permittee shall submit a draft WSSP plan within three years of the issuance of the ITP. Permittee shall incorporate comments from CDFW and submit the final WSSP plan for CDFW's approval (in-writing) within four years of the issuance of the ITP. Permittee shall conduct the required WSSP study twice, once before initiation of Project operations, within six years of issuance of the ITP, and once after the initiation of the Project (within three years of initiation of Project operations). Permittee shall include the following as part of the WSSP:	ITP Condition #8.8.1	Prior to and During Operations	Permittee	
	 A WS larval entrainment monitoring protocol; based on Poytress et. al., 2012, or best available science, determined in consultation with CDFW, to quantify the number of larvae present in the HCPS oxbow channel subject to entrainment behind the HCPS fish screen during the main period of larval WS presence near HCPS of January 1 through June 14 when no diversions are occurring, and during January 1 through June 14 of the first year of Project operations while the Project is actively diverting. A schedule of implementation, including deadlines for monitoring reports as part of the plan submission process, in consultation with CDFW. A data management plan for each required study. A plan to characterize the effects of the HCPS fish screens on WS survival and mortality in the 				
	 immediate vicinity of the fish screens. This plan shall include: Quantification and characterization of trends in mortality due to entrainment of larval and juvenile WS, 30 mm or less through the HCPS fish screen. Quantification of survival along the full HCPS oxbow channel inlet to the outlet. 				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
33	White Sturgeon Acoustic Telemetry Program. Permittee shall outline a White Sturgeon Acoustic Telemetry Program (WSATP) to improve understanding of the routing and movement of adult and juvenile WS in the vicinity of the RBPP and HCPS diversion facility and provide further information on the potential effects of Project operations on routing and movement of WS in the upper Sacramento River. Permittee shall submit the WSATP draft plan to CDFW for review within one year of the issuance of the ITP. Permittee shall incorporate comments from CDFW and submit the final WSATP for CDFW's approval (in writing) within two years of the issuance of the ITP. Long-term monitoring shall commence within three years of the issuance of the ITP and shall continue for the full term of the ITP. Permittee shall maintain all associated equipment in working condition for the term of the ITP. Permittee shall submit Annual Reports at a schedule and frequency identified in the final CDFW-approved plan for the term of the ITP. The report format and reporting requirements shall also be determined in consultation with CDFW during the plan submission and approval process. Permittee shall include the following in the WSATP: • Permittee shall determine, in consultation with CDFW through the draft submission process, the appropriate equipment to employ, the number of adult or juvenile WS individuals to tag, the schedule and duration of the tagging program, the number of acoustic receivers to install, and the locations of the acoustic receivers. • The WSATP shall include details on permanent placement of real-time JSATS and 69 kilohertz (khz) acoustic telemetry receiver arrays (each array shall be composed of two receivers, placed on opposite sides of the channel) in a minimum of five locations that are chosen in consultation with CDFW (examples below): • Bend Bridge (upstream of RBPP) • Red Bluff Diversion Dam (downstream of the RBPP fish screen) • In the HCPS oxbow channel below the flow control weir and lower HCPS oxbow channel confluence.	ITP Condition #8.8.2	Prior to and During Operations	Permittee	
	future minimizations.				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
34	Seasonal White Sturgeon Larval Monitoring Program. Permittee shall develop a Seasonal White Sturgeon Larval Monitoring Program (SWSLMP) for continuous, long-term monitoring to improve understanding of the presence and movement of larval WS in the vicinity of the HCPS diversion facility during the main period of larval WS presence near HCPS of February 1 through June 14 and provide further information on the potential effects of Project operations on routing and movement of WS in the upper Sacramento River. Permittee shall submit a draft study plan within three years of issuance of the ITP that includes detailed information on the study using the principles outlined in this section. Permittee shall incorporate comments from CDFW and submit the final plan for CDFW's approval (in writing) within four years of the issuance of the ITP. The program based on the final study shall be initiated within five years of issuance of the ITP and continue for the term of the ITP. Permittee shall include the following in the SWSLMP:	ITP Condition #8.8.3	Prior to and During Operations	Permittee	
	 Permittee shall determine in consultation with CDFW through the draft submission process the appropriate sampling protocol and equipment to employ (based on Poytress et. al., 2012, or best available science), the seasonal sampling window and sampling intervals, and a regular reporting interval for data collected. In revealing patterns in larval densities and distributions, the SLWSMP may also inform the need for future minimizations related to Project operations 				
35	White Sturgeon Predator Study Program. Permittee shall adhere to the timeline and science requirements for a WS Predator Study Program following the protocols described in the CHNSR and CHNWR requirements in Condition of Approval 8.7.2 (Predator Study Program).	ITP Condition #8.8.4	Prior to and During Operations	Permittee	
36	Longfin Smelt and Delta Smelt Science Requirements. To improve understanding of impacts to LFS and DS from Project operations, Permittee shall fund, initiate, and implement the monitoring program and science requirement described below. This new monitoring and science shall be identified in the Conditions of Approval 8.9.1 and 8.9.2, and may be combined with existing surveys and data to: 1) continue to build knowledge regarding the biology and life history of Covered Species; 2) better understand potential impacts of Covered Activities on Covered Species; 3) inform whether refinements or modifications to the Project's operational criteria have the potential to further minimize impacts to Covered Species.	ITP Condition #8.9	Prior to and During Operations	Permittee	
37	Longfin Smelt Life Cycle Model. Permittee shall in collaboration with CDFW utilize the Longfin Smelt Life Cycle Model (LFSLCM) (DWR et. al., 2020) to determine effects of Project-related changes in Delta flows and salinities on LFS. Permittee shall within one year of the availability of the LFSLCM for public use, further coordinate with CDFW on the development of model inputs to evaluate Project effects on all LFS life stages and vital rates (birth rates, death rates, growth rates, transition rates from one life stage to next, etc.) predicted by the LFSLCM. Permittee shall within two years of the LFSLCM availability for public use, compare LFS life stage abundances and vital rates among at least three Project scenarios depicting the full range of operations that can be reasonably foreseen and the NAA by simulating all four scenarios in CalSim 3 and DSM2 (or similar modeling tools, using the best available science), and using the relevant Calsim 3 and DSM2 outputs as inputs to the LFSLCM. Permittee shall, in coordination with CDFW, verify the quantification of Project impacts from the LFSLCM to LFS and consult with CDFW about potential amendments to the ITP, if warranted.	ITP Condition #8.9.1	Prior to Operations	Permittee and CDFW	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
38	Sediment Monitoring Plan. Permittee shall develop and implement a sediment monitoring plan (SMP) to collect the necessary data to quantify the entrainment of sediment by the Project's diversions at the RBPP and HCPS diversion facilities. Permittee shall submit the draft SMP plan to CDFW within three years of ITP issuance. Permittee shall incorporate comments from CDFW and submit the final SMP plan for CDFW's approval (in-writing) within four years of the issuance of the ITP. The SMP shall include continuous monitoring of suspended sediment concentrations in the Sacramento River and in the water diverted at RBPP and HCPS for the Project. Sediment monitoring shall begin withing five years of the issuance of the ITP and shall continue for at least five years after initiation of Project operations. The SMP shall also include the most up to date and available scientific data to determine performance criteria for assessing the impact of reduced suspended sediment in the Sacramento River on DS abundance, recruitment and spatial distribution. The sediment monitoring data shall be used to refine models of sediment entrainment at RBPP and HCPS as a result of the Project and determine if sediment management actions are needed to minimize the incremental loss of sediment due to Project operations. If performance criteria indicate biologically significant impacts are found as a result of the Project, a Sediment Reintroduction Plan shall be developed by the Permittee and approved by CDFW. Permittee shall conduct any necessary environmental review prior to finalizing and implementing the sediment reintroduction plan.	ITP Condition #8.9.2	Prior to and During Operations	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
39	Water Quality Monitoring Plan for Pesticides at the Knights Landing Outfall Gates to the Sacramento River and the Knights Landing Ridge Cut to the Yolo Bypass. Permittee shall within seven years of ITP issuance submit a Water Quality Monitoring Plan (WQMP) to evaluate the potential for elevated pesticide concentrations due to Project-related water discharges at the KLOG to the Sacramento River and KLRC to the Yolo Bypass that may impact Covered Species (DS, CHNWR, CHNSR, and WS). Permittee shall incorporate comments from CDFW and submit the final monitoring plan for CDFW's approval (in-writing) within eight years of the issuance of the ITP. Permittee shall initiate the WQMP within the first year of Project operations and continue monitoring for the term of the ITP. Permittee shall develop the WQMP to analyze the potential impacts on Covered Species as a result of elevated pesticide concentrations in water discharges. Permittee shall as part of the WQMP include potential minimizations for pesticides, including cessation of discharges. Permittee may be subject to an amendment, as specified in Section 6 of the ITP, depending on minimization measures identified in the WQMP.	ITP Condition #8.10, 8.10.1, 8.10.2, and8.10.3	Prior to and During Operations	Permittee	
	Pesticide Concentrations Monitoring Methods. Permittee shall collect and analyze pesticide concentrations in water and suspended sediment samples before and during water discharge from the Project conveyance facilities to the KLOG to the Sacramento River and KLRC to the Yolo Bypass. Permittee shall determine the timeframe and frequency of sample collection in consultation with CDFW as part of the WQMP review and approval process described above. Water samples will be collected at a time and frequency in relation to water releases in consultation with CDFW. Permittee shall determine the specific sample collection locations in consultation with CDFW, as part of the WQMP review and approval process described above.				
	Sample Collection Protocols. Permittee shall collect the following information with all water samples at the time of collection; temperature, DO, pH, and GPS location. Permittee shall collect all samples according to the sample collection protocols set forth in the most recent California Department of Pesticide Regulation (DPR) Report; Study 310: Surface Water Monitoring for Pesticides in Agricultural Areas of Northern California (DPR, 2024), or utilizing the most up to date version of the DPR report. Permittee shall be required to analyze the water samples, including suspended sediments for the suite of pesticides listed in the DPR report recommended for monitoring. Samples will additionally be analyzed for the pesticides listed below, if they are not included in the DPR list of pesticides recommended for monitoring; Bifenthrin, Carbaryl, Carbofuran, Chloropyrifos, Diazinon, Esfenvalerate, Ethoprop, Fipronil and Malathion. Permittee shall consult with CDFW on an annual basis to determine if additional pesticides are recommended for monitoring.				
	Sample Analysis and Reporting. Permittee shall submit all sample analysis to a laboratory certified under the Environmental Laboratory Accreditation Program. Permittee shall develop a reporting structure and timeline for the sample analysis reports to CDFW and determine the reporting frequency of the overall analysis as part of the final WQMP review and approval process described above.				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
40	Detrimental Metals Monitoring Plan. Permittee shall develop a Detrimental Metals Monitoring Plan (DMMP) and submit to CDFW within seven years of ITP issuance to determine the effects of Project-related water releases on detrimental metal concentrations within the CBD, KLOG to the Sacramento River, and KLRC to the Yolo Bypass that may impact Covered Species (DS, CHNWR, CHNSR and WS). Permittee shall incorporate comments from CDFW and submit the final DMMP plan for CDFW's approval (in-writing) within eight years of the issuance of the ITP. Permittee shall initiate the DMMP monitoring upon initiation of operational water releases and continue the monitoring for the term of the ITP. Permittee shall develop the DMMP to monitor detrimental metal concentrations in water and suspended sediments at multiple locations within the CBD, Yolo Bypass, and the Sacramento River. Permittee shall determine the monitoring locations in consultation with CDFW as part of the submission and review process of the DMMP. Permittee shall develop the schedule and frequency of the monitoring to occur at the stations, once station locations are determined, in consultation with CDFW as part of the submission and review process of the DMMP. Permittee shall determine a sample collection protocol in consultation with CDFW. Permittee shall develop a reporting process for the term of the ITP in consultation with CDFW. Permittee shall develop a reporting process described above. Permittee shall ensure that all samples are submitted to a certified laboratory to analyze samples in consultation with CDFW as part of the final plan review and approval process described above. Permittee shall as part of the DMMP include potential minimizations for detrimental metals, including cessation of discharges. Permittee may be subject to an amendment, as specified in Section 6 of the ITP, depending on minimization measures identified in the DMMP.	ITP Condition #8.11	Prior to and During Operations	Permittee	
DU	RING OPERATIONS				
41	Designated Fisheries Biologist Authority. To ensure compliance with the Conditions of Approval of the ITP, the Designated Fisheries Biologist shall immediately stop any activity that does not comply with the ITP and/or order any reasonable measure to avoid the unauthorized take of an individual of the Covered Species. Permittee shall facilitate unfettered access to the Project and otherwise facilitate the Designated Fisheries Biologist in the performance of his/her duties. If the Designated Fisheries Biologist is unable to comply with the ITP, then the Designated Fisheries Biologist shall notify the CDFW Representative immediately. Permittee shall not enter into any agreement or contract of any kind, including but not limited to non-disclosure agreements and confidentiality agreements, with its contractors and/or the Designated Fisheries Biologist that prohibit or impede open communication with CDFW, including but not limited to providing CDFW staff with the results of any surveys, reports, or studies or notifying CDFW of any non-compliance or take. Failure to notify CDFW of any non-compliance or take or injury of a Covered Species as a result of such agreement or contract may result in CDFW taking actions to prevent or remedy a violation of the ITP.	ITP Condition # 7.3	During Operations	Permittee	
42	<u>Designated Fisheries Biologist Onsite Monitoring Requirements</u> . A Designated Fisheries Biologist shall be present for the duration of the following Covered Activities occurring within the Project Area and associated facilities:	ITP Condition # 7.4	During Operations	Permittee	
	•Removal, repair, maintenance, and/or installation of fish screens at RBPP or HCPS diversion facilities (Does not apply to automated maintenance cleaning events).				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
43	Covered Activities Monitoring Documentation. The Designated Fisheries Biologist(s) shall maintain Covered Activities-monitoring documentation on-site in either hard copy or digital format throughout the timeframes when the Designated Fisheries Biologist(s) is required on-site for Covered Activities as specified in Condition of Approval 7.4 (Designated Fisheries Biologist Onsite Monitoring Requirements), which shall include a copy of the ITP with attachments and a list of signatures of all personnel who have successfully completed the education program. Permittee shall ensure a copy of the construction-monitoring documentation is available for review at the Project site upon request by CDFW.	ITP Condition # 7.6	During Operations	Permittee	
44	<u>Hazardous Waste</u> . Permittee shall immediately stop and, pursuant to pertinent state and federal statutes and regulations, arrange for repair and clean up by qualified individuals of any fuel or hazardous waste leaks or spills at the time of occurrence, or as soon as it is safe to do so. Permittee shall exclude the storage and handling of hazardous materials from the Project Area and shall properly contain and dispose of any unused or leftover hazardous products off-site.	ITP Condition # 7.7	During Operations	Permittee	
45	<u>CDFW Access</u> . Permittee shall provide CDFW staff with reasonable access to the Project, which shall include facilities that are owned and operated by Permittee's member agencies to implement Covered Activities and mitigation lands under Permittee control, and shall otherwise fully cooperate with CDFW efforts to verify compliance with or effectiveness of mitigation measures set forth in the ITP.	ITP Condition # 7.8	During Operations	Permittee	
46	Notification of Non-compliance. The Designated Representative shall immediately notify CDFW if Permittee is not in compliance with any Condition of Approval of the ITP, including but not limited to any actual or anticipated failure to implement measures within the time periods indicated in the ITP and/or this MMRP. The Designated Representative shall follow up within forty-eight hours with a written report to CDFW describing, in detail, any non-compliance with the ITP and suggested measures to remedy the situation.	ITP Condition # 8.2	During Operations	Permittee	
47	Annual Status Report. Permittee shall provide CDFW with an Annual Status Report (ASR) no later than December 1 of every year beginning with issuance of the ITP and continuing until CDFW accepts the Final Mitigation Report identified below. The ASR shall be submitted to the CDFW offices listed in the Notices section of the ITP and via e-mail to CDFW's Regional Representative and Headquarters CESA Program. CDFW may at any time increase the timing and number of compliance inspections and reports required under this provision depending upon the results of previous compliance inspections. If CDFW determines the reporting schedule must be changed, CDFW will notify Permittee in writing of the new reporting schedule.	ITP Condition # 8.3	For the term of the ITP	Permittee	
	Permittee shall include, at a minimum in the ASR: (1) summary information from the prior water year October 1 through September 30, as applicable to the Conditions of Approval in the ITP; (2) a copy of the table in this MMRP with notes showing the current implementation status of each Condition of Approval and mitigation measure; (3) an assessment of the effectiveness of each completed or partially completed mitigation measure in avoiding, minimizing and mitigating Project impacts; (4) Notification of Species Occurrences; as described in Condition of Approval 8.4 (CNDDB Observations); (5) all available information about Project related incidental take of the Covered Species Condition of Approval 8.6 (Notification of Take or Injury); and (6) Annual updates on the status of Compensatory Mitigation as described in Condition of Approval 10 (Habitat Management Land Acquisition and Permittee Responsible Mitigation) of the ITP.				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
48	CNDDB Observations. The Designated Fisheries Biologist shall submit all observations of Covered Species to CDFW's California Natural Diversity Database (CNDDB) annually for the term of the ITP and shall include summaries of the observations in the next ASR (Condition of Approval 8.3, Annual Status Report).	ITP Condition # 8.4	For the term of the ITP	Permittee	
49	Notification of Take or Injury. Permittee shall immediately notify the Designated Fisheries Biologist if a Covered Species is taken or injured by a Project related activity, or if a Covered Species is otherwise found dead or injured within the vicinity of the Project. The Designated Fisheries Biologist or Designated Representative shall provide initial notification to CDFW by calling and providing email to the CDFW offices listed in the Notices section of the ITP. The initial notification to CDFW shall include information regarding the location, species, and number of Covered Species taken or injured and the ITP Number (No. 2081-2023-051-00). Following initial notification, Permittee shall send CDFW a written report within two calendar days. The report shall include the date and time of the finding or incident, location of the Covered Species or carcass, and if possible, provide a photograph, explanation as to cause of take or injury, and any other pertinent information.	ITP Condition # 8.6	For the term of the ITP	Permittee	
50	<u>Data Accessibility</u> . Permittee shall provide CDFW with access to all raw data and associated analyses, including in digital tabular format, and reports for all monitoring and reporting identified in the ITP, as specified in the corresponding subsections of Condition of Approval 8, or if not specifically identified Permittee shall provide the raw data and associated analysis upon request from CDFW.	ITP Condition # 8.12	For the term of the ITP	Permittee	
51	No Diversion Without Fish Screens. Permittee shall not divert water at an individual diversion facility location (RBPP or HCPS) at any time unless the fish screen panels are installed, maintained, and fully operational at that individual diversion facility location. Permittee shall notify CDFW within two business days (in-writing) if the fish screens are not operational at the RBPP or HCPS diversion facility at a time that the Project is diverting at such facility or is projected to divert at such facility.	ITP Condition # 9.1	Prior to and During Operations	Permittee	

Velocity Requirement at Red Bluff Pumping Plant and Hamilton City Pump Station Fish Screens. To minimize impingement and entrainment of CHNWR, CHNSR and WS, Permittee may only divert when the RBPP and HCPS fish screens are operating according to the CDFW Fish Screening Criteria (CDFW, 2000). Permittee's maximum diversion rate, given the water surface elevation, shall be determined through hydraulic testing of the RBPP and HCPS fish screens. In order to comply with the CDFW Fish Screening Criteria, Permittee shall not exceed the spatially-averaged approach velocity (V _a) of 0.33 fps at the RBPP and HCPS fish screens. Spatially-averaged approach velocity shall be defined as the mean of all measurements taken on the fish screen(s). Permittee shall not cause the mean V _a of the screen to exceed one-half of the spatially-averaged sweeping velocity (V _s). Permittee may only divert, as indicated by velocity testing, if any one point measured during hydraulic testing does not exceed 0.33 × 1.2 (1.2 = 20 percent approach velocity fluctuation factor), or 0.4 fps. If Permittee is using a testing grid with more points than required in this condition, then Permittee may only divert, as indicated by velocity testing, if less than 0.2 percent of the points measured during hydraulic testing does not exceed 0.33 × 1.2 (1.2 = 20 percent approach velocity fluctuation factor), or 0.4 fps. Compliance shall be determined through periodic hydraulic testing as specified below.	ITP Condition # 9.2, 9.2.1, 9.2.2, 9.2.3, 9.2.4, 9.2.5, 9.2.6, and 9.2.7	Prior to and During Operations	Permittee	
Hydraulic Testing Plan for Velocity Requirements. Permittee shall prepare a Hydraulic Testing Plan (HTP) to demonstrate the RBPP and HCPS fish screens are operating within the CDFW Fish Screening Criteria under the flow conditions under which the Project would be operating as specified in Condition of Approval 9.2 above. The Plan shall also include a test to demonstrate that the automated cleaning system is working as expected to remove accumulated debris from the fish screen surface. A draft HTP shall be submitted to CDFW within five years of the issuance of the ITP. Permittee shall incorporate comments from CDFW and submit the final HTP for CDFW's approval (in-writing) within six years of the issuance of the ITP. The HTP shall include all elements required by Conditions of Approval 9.2; 9.2.2, 9.2.3, 9.2.4, 9.2.5, 9.2.6, and 9.2.7.				
Hydraulic Testing Schedule. After final HTP approval, Permittee shall conduct one initial hydraulic test at the RBPP and HCPS fish screens after installation of the new headgate structure within the GCID Main Canal and the new diversion pumps at the RBPP diversion facility, but before Project operations commence. Permittee shall conduct one additional hydraulic test within the first year of Project diversions at the RBPP and HCPS diversion facilities. In the event that the new diversion pumps at RBPP or the new headgate structure within the GCID Main Canal become operational within one year of Project diversions, the testing at each screen may be combined into one testing period. Thereafter, Permittee shall conduct periodic hydraulic testing during Project diversions every five years for the term of the ITP. Permittee may also be required to conduct additional hydraulic testing following a qualifying event as specified below:				
 Changes to Project facilities or Permittee's operations affecting fish screen operations, as determined by CDFW. Channel morphology changes in the vicinity of the RBPP and HCPS fish screens that may affect the efficacy of the fish screen function, such as the HCPS oxbow channel. Changes or adjustments to the RBPP or HCPS fish screens that may affect fish screen function, such as, tuning baffle adjustments or replacement of fish screen panels with new design (e.g., screen panel size or screen slot size changes). Additional qualifying events identified by Permittee or CDFW in the HTP with the potential to increase V_a above the CDFW Fish Screening Criteria. 				

All hydraulic testing associated with qualifying events shall be initiated within three months of the completion of the qualifying event, or as may be approved by CDFW, considering Project operations, potential safety hazards, and specific conditions at the facility to be tested.

<u>Hydraulic Testing Procedures</u>. The Permittee shall conduct all hydraulic testing events previously described above, using the following procedures and parameters for the RBPP and HCPS fish screens. Permittee shall also provide detailed methods of the procedures and parameters for hydraulic testing in the HTP:

- Permittee shall test each fish screen at the maximum allowable diversion rate, given the water surface elevation at the screen, such that the theoretical mean V_a across the screen does not exceed 0.33 fps.
- Permittee shall measure V_a and V_s on a grid spanning the length and height of each fish screen at the RBPP and HCPS using methods that follow guidance from the U.S. Bureau of Reclamation (USBR 2009; USBR 2017).
- The V_a and V_s measurement grid shall cover the entire wetted area of each fish screen at a
 resolution of no less than 15 square feet (e.g., if the wetted area of the screen is 7,500 square
 feet, V_a and V_s measurements should be made at a minimum of 500 evenly spaced locations on
 the screen face). An approximate schematic of the testing grid shall be included in the HTP.
- If required, tuning baffles on each screen shall be adjusted prior to testing to minimize V_a hotspots (V_a > 0.33 fps or V_a > 0.5V_s). If V_a hotspots are still detected during testing, tuning baffles shall be readjusted and the affected screen area re-tested until V_a conforms to CDFW Fish Screening Criteria.

Red Bluff Pumping Plant Testing Parameters. Permittee shall conduct hydraulic testing under the maximum allowable diversion rate at RBPP, as specified by the Conditions of Approval in the ITP (maintaining spatially-averaged $V_a \le 0.33$ fps), given the water surface elevation during testing. Once the HTP is approved, the Permittee shall conduct hydraulic testing in high instream flow conditions (instream flows greater than or equal to 7,860 cfs). Instream flow for the RBPP shall be determined by the Bend Bridge – California Data Exchange (C-DEC) Station ID: BND.

Hamilton City Pump Station Testing Parameters. Permittee shall conduct hydraulic testing under the maximum allowable diversion rate at HCPS, as specified by the conditions of the ITP (maintaining spatially-averaged $V_a \le 0.33$ fps), given the water surface elevation during testing. Once the HTP is approved, the Permittee shall conduct hydraulic testing in high instream flow conditions (instream flows greater than or equal to 7,700 cfs). The Permittee shall also monitor the mean HCPS oxbow channel flow upstream and downstream of the HCPS fish screen and the flow-control weir crest elevation during all testing events and include these measurements in all HCPS hydraulic testing reports (Condition of Approval 9.2.7). Instream flow for the HCPS shall be determined by the Hamilton City Station − California Data Exchange (CDEC) Station ID: HMC plus Permittee and non-Permittee diversions at the HCPS diversion facility.

Approach Velocity Testing Compliance. Permittee shall provide all hydraulic testing data to CDFW within seventy-two hours of all approach velocity tests. Permittee shall, if testing data determines non-compliance with the CDFW Fish Screening Criteria, conduct baffle adjustments within seven days of a non-compliant hydraulic test, and Permittee shall retest within seven days of the baffle adjustment and

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
	provide the subsequent hydraulic testing data to CDFW within seventy-two hours. CDFW shall determine whether baffle adjustment and retesting has demonstrated compliance, and if additional baffle adjustments and testing are required. Permittee shall employ additional actions, as needed, to maintain approach velocity such as the decrease of Project diversion rates at the RBPP or HCPS diversion facilities, if approach velocity cannot be maintained under the CDFW Fish Screening Criteria. Permittee shall detail all retesting in the subsequent Hydraulic Testing Report as described below. Hydraulic Testing Reports. Permittee shall submit all hydraulic testing reports within thirty days of completion for all hydraulic tests described above to CDFW. The reports shall at minimum include: The date(s), times and total duration of each testing session; The testing methods employed; The condition of the screen during testing (percent of screen damaged, percent fouled, etc.); Time since automated cleaning equipment last operated; Date of last manual cleaning of the screen; A detailed account of any difficulties encountered during testing that prevented measurement, or affected Va or Vs at one or more locations on the screens; A detailed account of fish screen tuning baffle positions before any adjustments made for testing, all tuning baffle adjustments made before testing, and all readjustments and re-testing performed. The water surface elevation at the screen face during testing; The mean bypass flow and diversion rate during testing; for HCPS, the mean Oxbow flow upstream and downstream of the HCPS fish screen during testing and the flow control weir crest height during testing. The fish screen panel tested, and exact location of each measurement point on each panel; Each measured Va and each measured Va for the HCPS fish screen, the mean HCPS oxbow channel flow upstream and downstream of the HCPS fish screen, and the flow-control weir crest elevation during testing shall be provided. All data shall be submitted to CDF				
53	<u>Disinfect Equipment Prior to Entry into Watercourses</u> . To prevent spread of invasive aquatic species and diseases, gear and equipment to be used in watercourses including, but not limited to, boots, waders, hand tools, and nets must be decontaminated pursuant to the CDFW Aquatic Species Decontamination Protocol prior to entry into a watercourse.	ITP Condition # 9.3	During Operations	Permittee	
54	Maximum Total Annual Diversions. Permittee shall not exceed the maximum total annual diversion of 986 TAF combined at the RBPP and HCPS diversion facilities. The Permittee shall not divert water at the RBPP and HCPS above the maximum annual diversion volumes of 660 TAF and 421 TAF, respectively, for each location, while still remaining below the maximum total annual diversion of 986 TAF at the diversion facilities for the Project.	ITP Condition # 9.4	During Operations	Permittee	
55	Red Bluff Pumping Plant Maximum Diversion Rate. Permittee shall not divert water in exceedance of the maximum instantaneous diversion rate at the RBPP of 2,120 cfs.	ITP Condition # 9.5	During Operations	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
56	<u>Hamilton City Pump Station Maximum Diversion Rate</u> . Permittee shall not divert water in exceedance of the maximum instantaneous diversion rate at the HCPS of 2,070 cfs.	ITP Condition # 9.6	During Operations	Permittee	
57	Water Diversion Season. Permittee shall only divert water from RBPP and HCPS between September 1 and June 14 each year.	ITP Condition # 9.7	During Operations	Permittee	
58	<u>Diversions During Excess Conditions</u> . Permittee shall only divert when the Delta has been determined by DWR and Reclamation to be in excess conditions and in initiating diversions, Net Delta Outflow Index has increased by an additional 3,000 cfs after the determination of the excess conditions.	ITP Condition # 9.8	During Operations	Permittee	
59	Temporary Urgency Change Order for Delta Water Quality Objectives. Permittee shall not divert water to storage during times when Bay-Delta Water Quality Control Plan requirements for Delta Outflow, X2 (Spring), Rio Vista, Emmaton, Jersey Point, and Delta Export to Inflow (E:I) ratio are modified by a Temporary Urgency Change Petition/Order and the CVP or SWP are operating to the modified conditions.	ITP Condition # 9.9	During Operations	Permittee	
60	Sacramento River Bypass Flow Criteria at Red Bluff Pumping Plant. Permittee shall not divert water until the Sacramento River flow at RBPP is at or above 3,250 cfs. Diversions shall not result in Sacramento River flow at RBPP to be less than 3,250 cfs at all times. Diversions shall cease once Sacramento River flow at RBPP drop below 3,250 cfs. Sacramento River flow shall be determined by California Data Exchange (CDEC) Station at Bend Bridge (BND) minus Permittee and non-Permittee diversions at the RBPP diversion facility.	ITP Condition # 9.10	During Operations	Permittee	
61	Sacramento River Bypass Flow Criteria at Hamilton City Pump Station. Permittee shall not divert water until the Sacramento River flow at HCPS is at or above 4,000 cfs. Diversions shall not result in Sacramento River flow at HCPS to be less than 4,000 cfs at all times. Diversions shall cease once Sacramento River flow at HCPS drops below 4,000 cfs. Sacramento River flow shall be determined by CDEC Station at Hamilton City (HMC).	ITP Condition # 9.11	During Operations	Permittee	
62	Sacramento River Bypass Flow Criteria at Wilkins Slough. Permittee shall not divert water if the flow in the Sacramento River at Wilkins Slough will decline below 10,930 cfs as indicated by United States Geological Survey (USGS) Station 11390500 - Sacramento R BL Wilkins Slough NR Grimes CA. This will be determined using the following criteria:	ITP Condition # 9.12	During Operations	Permittee	
	 The Real-Time flow at USGS Station 11390500 exceeds 10,930 cubic feet per second (cfs). The California Nevada River Forecast Center (CNRFC) forecasted flow at station WLKC1 exceeds 10,930 cfs for the subsequent seventy-two hours following the estimated start time of any diversion event. The forecasted flow continues to exceed 10,930 cfs at CNRFC station WLKC1 for seventy-two hours after the diversion event is scheduled to end. The forecasted flow at CNRFC station WLKC1 shall be re-evaluated for the duration of the diversion event, a minimum of every twenty-four hours by the Permittee to ensure the projected forecast has not changed and the forecasted flow continues to exceed 10,930 cfs. Forecasting of the seventy-two-hour travel time between the diversions facilities and Wilkins Slough may be modified based on best available science and with approval from CDFW. 				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
63	Allowable Diversions During Simultaneous Use at Red Bluff Pumping Plant and Hamilton City Pump Station. If Permittee and non-Permittee diversions occur simultaneously at the RBPP or HCPS, the Permittee shall continue to maintain USGS Station 11390500 and CNRFC Station WLKC1 above 10,930 cfs while accounting for the additional non-Permittee diversions. The total allowable diversions shall be determined by the following equation: $Available\ Flow\ for\ Permittee\ Diversions\ (cfs) = WLK_{72hrForecast} - (10,930 + RB_{NonPermitteeDiv} + HC_{NonPermitteeDiv})$ where $WLK_{72hrForecast}$ is the CNRFC 72-hour forecast, $RB_{NonPermitteeDiv}$ is non-Permittee diversions at	ITP Condition # 9.13	During Operations	Permittee	
	Red Bluff and $HC_{NonPermitteeDiv}$ is non-Permittee diversions at Hamilton City to the extent these diversions are not already accounted for in $WLK_{72hrForecast}$.				

64	Flow Dependent Diversion. Permittee shall divert no more than a specified amount of Sacramento River
٠.	flow at the RBPP and HCPS under the following criteria for Flow Dependent Diversion (FDD) to
	minimize impacts to CHNWR, CHNSR, and WS from near-field effects at the RBDD and HCPS fish
	screens and to minimize the effects of reduced flow in the Sacramento River. The requirements
	specified in this Condition of Approval shall be adhered to in addition to all other applicable diversion
	requirements specified in the ITP. Permittee shall not initiate diversions at the RBPP from January 1 to
	February 28 (Feb. 29 in leap years) until Sacramento River flow at Bend Bridge exceeds 4,800 cfs.
	Permittee shall not initiate diversions at the RBPP from September 1 to December 31 and March 1 to
	June 14 until Sacramento River flow at Bend Bridge exceeds 6,295 cfs. Permittee shall not initiate
	diversions at HCPS from September 1 to June 14 until Sacramento River flow at HCPS exceeds 10,500
	cfs. Permittee shall determine river flow at RBPP utilizing real-time observations at CDEC Station Bend
	Bridge (BND). Permittee shall determine river flow at HCPS by adding the real-time observations at
	CDEC Station Hamilton City (HMC) to the current HCPS diversion rate for Permittee and non-Permittee
	diversions, as CDEC Station HMC is downstream of HCPS. Adjustments to diversions shall be required
	once per day as needed. However, Permittee may elect to adjust diversions more frequently than once
	per day.

Flow Dependent Diversion Requirements at the Red Bluff Pumping Plant. Permittee shall divert no more than the maximum allowable diversion rate (cfs) from January 1 to February 28 (Feb. 29 in leap years) as specified in Table 2 of the ITP for the RBPP. From January 1 to February 28, if real-time flow at Bend Bridge (BND) is within the range given in Table 2 of the ITP but is other than the values given in Table 2 of the ITP, Permittee shall determine the maximum allowable diversion rate at RBPP by linear interpolation between the values in Table 2 of the ITP.

Table 2. Flow Dependent Diversion Requirements at Red Bluff Pumping Plant (Jan. 1 to Feb. 28/29).

 II-Time Flow at Bend ridge (BND) in (cfs)	Maximum Diversion (cfs)
4,800	0
5,000	130
6,000	230
7,000	360
8,000	520
9,000	710
10,000	930
11,000	1,180
12,000	1,450
13,000	1,760
14,000	2,100

7.14.2

Permittee

During Operations

ITP Condition #

9.14.2

9.14, 9.14.1, and

14,100	2,120
>14,000	2,120

Permittee shall divert no more than the maximum allowable diversion rate (cfs) from March 1 to June 14 and September 1 to December 31 as specified in Table 3 for the RBPP. From March 1 to June 14 and from September 1 to December 31, if real-time flow at Bend Bridge (BND) is within the range given in Table 3 but is other than the values given in Table 3, Permittee shall determine the maximum allowable diversion rate at RBPP by linear interpolation between the values in Table 3.

<u>Table 3</u>. Flow Dependent Diversion Requirements at Red Bluff Pumping Plant (March 1 to June 14 and Sep. 1 to Dec. 31)

Real-Time Flow at Bend Bridge (BND) in (cfs)	Maximum Diversion (cfs)
6,300	0
7,000	120
8,000	220
9,000	340
10,000	480
11,000	640
12,000	810
13,000	1,010
14,000	1,220
15,000	1,460
16,000	1,710
17,000	1,980
17,500	2,120

Flow Dependent Diversion Requirements at the Hamilton City Pump Station. Permittee shall divert no more than the maximum allowable diversion rate (cfs) from September 1 to June 14 as specified in Table 4 at the HCPS. From September 1 to June 14, if real-time flow at Hamilton City (HMC) is within the range given in Table 4 but is other than the values given in Table 4, Permittee shall determine the maximum allowable diversion rate at RBPP by linear interpolation between the values in Table 4.

				Imple	ementation	Responsible	Status Date /
Mitigation Mo	easure		Source	Sche	dule	Party	Initials
<u>「able 4</u> . Flow D Sep. 1 to June <u>1</u>	ependent Diversion Requirements at Har I4)	nilton City Pump Station (Full Diversion	n Period:				
·	Real-Time Flow at Hamilton City (HMC) in (cfs)	Maximum Diversion (cfs)					
	10,500	0					
	11,500	280					
	12,500	370					
	13,500	480					
•	14,500	590					
	15,500	720					
	16,500	850					
Ī	17,500	980					
	18,500	1,130					
Ī	19,500	1,290					
	20,500	1,450					
	21,500	1,620					
	22,500	1,800					
	23,500	1,990					
	24,500	2,200					

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
65	 Cessation of Diversions at Red Bluff Pumping Plant and Hamilton City Pump Station. The Permittee shall initiate ramp down procedures for diversions immediately, when any of the following occur: Either USGS Station 11390500 or CNRFC - WLKC1 Station is nonoperational, or the data centers cease to provide data. Alternative methods of compliance may be developed if stations are nonoperational by the Permittee and shall be submitted to CDFW for review and approval (in-writing) prior to the initiation of operations. USGS Station 11390500 no longer exceeds 10,930 cfs. The seventy-two-hour forecast indicates the CNRFC Station WLKC1 no longer exceeds 10,930 cfs for the seventy-two-hour period following the estimated start time or end time of a diversion event. Any twenty-four-hour re-evaluation of the forecast indicates CNRFC Station WLKC1 will no longer exceed 10,930 cfs. The total diversion volume of Permittee and non-Permittee diversions as specified in Condition of Approval 9.13 (Allowable Diversions During Simultaneous Use at Red Bluff Pumping Plant and Hamilton City Pump Station) will reduce flow below 10,930 cfs as indicated at USGS Station 11390500 and CNRFC Station WLKC1. Downstream flow monitoring equipment or Project facilities that monitor water volumes diverted, exported, transferred, or exchanged related to the Project are nonoperational or cease to provide data. The equipment or facilities include, but are not limited to, Supervisory Control and Data Acquisition (SCADA) components at the RBPP or HCPS diversion facilities, flow monitoring equipment at the Terminal Regulating Reservoir, Funks Reservoir, I/O Facility, Sites Reservoir and at the DP. 	ITP Condition # 9.15	During Operations	Permittee	

66	<u>Diversion Criteria Reporting.</u> Permittee shall provide diversion reports for the RBPP and HCPS diversion facilities for all applicable Conditions of Approval in the Diversion Criteria section of the ITP (Conditions of Approval 9.4, 9.5, 9.6, 9.10, 9.11, 9.12, 9.13, 9.14, and 9.15). Permittee shall provide real-time diversion rate reports, in 15-minute time intervals using a public access data exchange webpage that publishes all required information on a real-time basis (15-minute time intervals). Diversion reporting for the real-time reports shall include:	ITP Condition # 9.16	During Operations	Permittee	
	 Date and Time (YYYY-MM-DD HH:MM:SS) of the observation Diversion rate at the diversion facility in cubic feet per second (cfs) Project diversion rate at the diversion facility in cubic feet per second (cfs) Sacramento River stage height at the diversion facility in feet (ft) Water Surface elevation on face of the fish screen at the diversion facility in feet (ft) 				
	Permittee shall submit seasonal diversion reports annually by August 15 with all the diversion data for the previous diversion season (September 1 to June 14), including all 15-minute time interval diversion data, to CDFW using a .csv (comma-separated values) spreadsheet or HEC DSSVue (.dss) file. The seasonal diversion report shall also include the following:				
	For the RBPP:				
	 Date and time (YYYY-MM-DD HH:MM:SS) of the observation Diversion rate at diversion facility (in cfs) Sacramento River stage height (in ft) at diversion facility Water surface elevation (in ft) on the face of the fish screen Head differential (in ft or in) at the front and back of fish screen(s) Sacramento River flow (in cfs) at Bend Bridge as reported by CDEC Station BND Sacramento River bypass flow, calculated as BND minus diversions Real-time flow (in cfs) at Wilkins Slough reported by USGS Station number 11390500 Minimum flow (in cfs) at Wilkins Slough forecasted over the seventy-two (72) hour window following the current real-time observation reported by CNRFC station WLKC1 				
	For the HCPS:				
	 Date and time (YYYY-MM-DD HH:MM:SS) of the observation Diversion rate at diversion facility (in cfs) Sacramento River stage height (in ft) at diversion facility Water surface elevation (in ft) on the face of the fish screen Head differential in feet or inches at the front and back of fish screen(s) Sacramento River flow (in cfs) at Hamilton City, calculated as CDEC Station HMC plus all diversion at the HCPS 				
	 Sacramento River bypass flow (in cfs) at Hamilton City as reported by CDEC Station HMC Real-time flow (in cfs) at Wilkins Slough reported by USGS Station number 11390500 				

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
	 Minimum flow (in cfs) at Wilkins Slough forecasted over the seventy-two (72) hour window following the current real-time observation reported by CNRFC station WLKC1 HCPS oxbow channel in-flow in (cfs) HCPS oxbow channel out-flow in (cfs) Flow control weir crest elevation in (ft) 				
67	Conveyance Reporting. Annually by August 15, Permittee shall provide conveyance reports with the daily water volumes conveyed by the Project to the Funks Reservoir, Terminal Regulating Reservoir and water pumped into and released from the Sites Reservoir via the Inlet/Outlet Tower. Permittee shall also provide the end of day (measured at 11:59 PM) water surface elevations from the Sites Reservoir. The conveyance reports shall be submitted seasonally (including data from September 1 to June 14) by August 15 each year to CDFW. The conveyance reports shall be made available as a .csv spreadsheet format with the following column headers; date; time; entity Permittee or Non-Permittee; transaction type (transfer, exchange, delivery, etc.); water volume, as applicable (acre-feet); diversion rate (cfs); and daily conveyance losses or gains estimated as a percent for a given conveyance.	ITP Condition # 9.17	During Operations	Permittee	
68	Water Exchanges and Transfers. Permittee shall not facilitate exchanges, including CVP operational flexibility, real-time exchanges and transfers, Shasta exchanges, and Oroville exchanges, that will conflict with the conditions in the ITP.	ITP Condition # 9.18	During Operations	Permittee	
69	Exchanges with Shasta Reservoir. Permittee shall not conduct an exchange with Shasta Reservoir if that exchange results in Reclamation not meeting its regulatory requirements.	ITP Condition # 9.19	During Operations	Permittee	
70	Exchanges with Oroville Reservoir. Permittee shall not conduct an exchange with Oroville Reservoir if that exchange results in DWR not meeting its regulatory requirements.	ITP Condition # 9.20	During Operations	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
71	Water Exchange and Temperature Management Requirement. Permittee shall develop a Water Exchange and Temperature Management Plan (WETMP) to demonstrate that Project-related exchanges with Shasta Reservoir, CVP operational flexibility, and real-time exchanges and transfers, will not result in significantly higher water temperatures in the Sacramento River between Hamilton City and the confluence of the Feather River during the months of April through June and August through October. For the purposes of this condition, water temperatures are considered significantly higher if the three-day average water temperature is between 60 degrees Fahrenheit (F) and 70 degrees F and the exchange or transfer would result in a three-day average water temperature that is more than 0.5 degrees F higher than would otherwise occur without exchanges. The WETMP shall be informed by, and its effectiveness demonstrated through, a water temperature modeling study to better understand the relationship between changes in flow volume and water temperature in the Sacramento River between Hamilton City and the confluence with the Feather River due to exchanges between Sites and Shasta Reservoir, CVP operational flexibility, and real-time exchanges and transfers. Permittee shall in coordination with CDFW, utilize a water temperature model to evaluate the influence of different factors on changes in water temperature, including but not limited to water year type, Sacramento River flow, and the timing and magnitude of flow change as a result of the Project. Results of the water temperature modeling study will be used to inform development of a WETMP, which shall describe details about the timing and magnitude of Project-related exchanges with Shasta Reservoir, CVP operational flexibility, and real-time exchanges and transfers would occur, and demonstrate through modeling that they will not result in significantly higher water temperatures. Permittee shall submit a proposed model and study design for CDFW review within through years of ITP is	ITP Condition # 9.21	Prior to and during Operations	Permittee	
	approved by CDFW (in-writing) for the term of the ITP.				
72	Timing of Releases to the Yolo Bypass. Permittee shall only release water at KLRC to the Yolo Bypass from August 1 to October 31.	ITP Condition # 9.22	During Operations	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
73	Knights Landing Outfall Gates Water Releases Temperature Requirements. Permittee shall only release water to the Sacramento River at KLOG after demonstrating through a temperature monitoring and modeling study that Project-related releases will not result in significantly higher water temperatures in the Sacramento River below KLOG during the months of April through June and August through October. For the purposes of this condition, water temperatures are considered significantly higher if the three-day average water temperature in the Sacramento River above KLOG is between 60 degrees F and 70 degrees F, and the release would result in the three-day average water temperatures at KLOG that are more than 0.5 degrees F higher than would otherwise occur without releases. Permittee shall use field data, including data collected under Condition of Approval 9.23.1, and conduct analyses to understand the water temperatures and total volume of release flows at KLOG due to actions of the Project and 1) water temperatures and total volume of release point to the Sacramento River and 2) water temperatures in the Sacramento River as a result of mixing. Actions include releases by the Project at KLOG, including water released for exchanges and transfers, and the movement of additional water from the CBD to KLOG and the Sacramento River. The study plan shall also consider any changes to temperature in the Sacramento River determined by the results from studies required by Condition of Approval 9.21 (Water Exchange and Temperature Management Requirement). Permittee shall submit a draft study plan for CDFW review within two years of ITP issuance. Permittee shall incorporate comments from CDFW and submit the final study plan for CDFW's approval (in-writing) within three years of the issuance of the ITP. Permittee will complete the study and submit a final report for CDFW approval within two years of the monitoring station required under Condition of Approval 9.23.1 being operational. Permittee shall operate according to the res	ITP Condition # 9.23, and 9.23.1	Prior to and during Operations	Permittee	
74	Knights Landing Ridge Cut (Yolo Bypass) Water Releases Temperature Requirements. Permittee shall not release water from KLRC to the Yolo Bypass when resulting water temperatures would exceed 70 degrees F as measured at Wallace Weir Fish Collection Facility to minimize impacts to CHNSR and DS.	ITP Condition # 9.24	During Operations	Permittee	

	Mitigation Measure	Source	Implementation Schedule	Responsible Party	Status / Date / Initials
75	Knights Landing Outfall Gates Water Releases Dissolved Oxygen Requirements. Permittee shall only release water at the KLOG to the Sacramento River after demonstrating that releases will not cause Sacramento River DO levels, between the KLOG gates and the western end of the Fremont Weir, to decrease to less than 5.0 milligrams per liter (mg/L). Permittee shall demonstrate through development of a study designed to collect data and conduct analyses to inform the relationship between the volume of release flows at KLOG due to actions of the Project and; 1) DO at the KLOG release point to the Sacramento River; and 2) DO in the Sacramento River below KLOG as result of mixing. Actions include releases by the Project and releases that occur as a result of the Project, such as exchanges and transfers and the movement of additional water from the CBD to KLOG and the Sacramento River. Permittee shall submit the draft study plan for CDFW review and approval (in-writing) within two years of ITP issuance. Permittee shall incorporate comments from CDFW and submit the final study plan for CDFW's approval (in-writing) within three years of the issuance of the ITP. Permittee will complete the study and submit a final report for CDFW approval within two years of the monitoring stations required under Condition of Approval 9.25.1 being operational. Permittee shall operate according to the results in the final report, as approved by CDFW (in-writing), that will specify the volume of Project-related releases that can occur without resulting in DO in the Sacramento River below KLOG to decrease to less than 5.0 mg/L during the months of April through June and August through October, throughout the term of the ITP. Knights Landing Outfall Gates Dissolved Oxygen Monitoring Stations and Reports. Permittee shall install and maintain at minimum two continuous monitoring stations within the geographic range described above in Condition of Approval 9.25 (Knights Landing Outfall Gates Water Releases Dissolved Oxygen Requirements) to measure	ITP Condition # 9.25 and 9.25.1	Prior to and during Operations	Permittee	
	If the stations identified above become non-operational the Permittee shall be responsible for the installation and maintenance of new or replacement stations for the term of the ITP. Permittee shall make DO Reports available for all DO stations using a public access, data exchange webpage that reports the station information on a real-time basis, at 15-minute time intervals. The DO Reports shall be made available in a .csv spreadsheet format with the following column headers; date, time, monitoring station and mg/L measurement.				
76	Knights Landing Ridge Cut (Yolo Bypass) Water Releases Dissolved Oxygen Requirements. Permittee shall not release water from KLRC to the Yolo Bypass when DO levels at Ridge Cut Slough at HWY 113 – (Station A0D84761435) are 5.0 mg/L or lower. Permittee shall utilize another station as approved by CDFW if Station A0D84761435 ceases to function, prior to the release of water. Permittee shall be required to initiate, install and maintain a new station if no feasible alternative exists. The location of any new station shall be subject to CDFW approval (in writing). Permittee shall make DO Reports available for all DO stations using a public access, data exchange webpage that reports the station information on a real-time basis, at 15-minute time intervals. The DO Reports shall be made available in a .csv spreadsheet format with the following column headers; date, time, monitoring station and mg/L measurement.	ITP Condition # 9.26	During Operations	Permittee	

Wallace Weir Upstream Attraction Flows. Permittee shall not release water at KLRC to Yolo Bypass via Wallace Weir, if adult salmonids are determined to be present at the Wallace Weir Fish Rescue Facility. Permittee shall not release water outside the August 1 to October 31 window. Permittee shall develop a monitoring plan designed to further inform whether Project releases to the Yolo Bypass attract salmonids. The plan shall include a minimum of two additional monitoring locations to be determined in coordination with CDFW, as well as methods to determine if attraction of adult salmonids has increased as a result of the Project. Permittee shall provide a draft of the monitoring plan to CDFW for review, and the final plan shall be subject to CDFW approval (in writing). Permittee shall fund additional staff, facility maintenance costs and costs for additional operations at the Wallace Weir Fish Rescue Facility caused	ITP Condition # 9.27	Prior to and during Operations	Permittee	
by the Project and genetic testing during the interim testing period, as applicable. Permittee shall develop and submit a draft monitoring plan to CDFW within three years of issuance of the ITP. The additional timeline of deliverables for installation of monitoring stations, and a cost estimate shall be determined in coordination with CDFW, as applicable.				
Winter-Run Chinook Salmon Protections. Within one year of obtaining a signed coordinated operational agreement among the Permittee, DWR, and Reclamation, Permittee shall use best available science as approved by CDFW to analyze proposed operations, considering the operational agreement, and the proposed use of Reclamation's investment in Sites and requirements from any subsequent permits. Permittee shall demonstrate that proposed operations do not result in a net decrease in average annual asscapement, as compared to a no-Project scenario, using best available science.	ITP Condition # 9.28	Within one year of obtaining a signed operational agreement	Permittee	
T-OPERATIONS				
Final Mitigation Report. No later than forty-five days after completion of all mitigation measures, or ninety days prior to the expiration of the ITP (whichever is sooner), Permittee shall provide CDFW with a Final Mitigation Report. The Designated Fisheries Biologist, or Designated Representative shall prepare the Final Mitigation Report which shall include, at a minimum: (1) a summary of all ASRs; (2) a copy of the table in this MMRP with notes showing when each of the mitigation measures was implemented; (3) all available information about Project related incidental take of the Covered Species; (4) information about other Project impacts on the Covered Species; (5) beginning and ending dates of Covered Activities; (6) an assessment of the effectiveness of the ITP Conditions of Approval in minimizing and ully mitigating Project impacts of the taking on Covered Species; (7) recommendations on how mitigation measures might be changed to more effectively minimize take and mitigate the impacts of uture projects on the Covered Species; (8) any other pertinent information.	ITP Condition # 8.5	After completion of all mitigation measures, or ninety days prior to the expiration of the term of the ITP	Permittee	
acide A A A A A A A A A A A A A A A A A A A	ditional timeline of deliverables for installation of monitoring stations, and a cost estimate shall be eletermined in coordination with CDFW, as applicable. Vinter-Run Chinook Salmon Protections. Within one year of obtaining a signed coordinated operational greement among the Permittee, DWR, and Reclamation, Permittee shall use best available science as oproved by CDFW to analyze proposed operations, considering the operational agreement, and the roposed use of Reclamation's investment in Sites and requirements from any subsequent permits. ermittee shall demonstrate that proposed operations do not result in a net decrease in average annual scapement, as compared to a no-Project scenario, using best available science. T-OPERATIONS Inal Mitigation Report. No later than forty-five days after completion of all mitigation measures, or nety days prior to the expiration of the ITP (whichever is sooner), Permittee shall provide CDFW with a inal Mitigation Report. The Designated Fisheries Biologist, or Designated Representative shall prepare the Final Mitigation Report which shall include, at a minimum: (1) a summary of all ASRs; (2) a copy of the table in this MMRP with notes showing when each of the mitigation measures was implemented; (3) I available information about Project related incidental take of the Covered Species; (4) information bout other Project impacts on the Covered Species; (5) beginning and ending dates of Covered ctivities; (6) an assessment of the effectiveness of the ITP Conditions of Approval in minimizing and ally mitigating Project impacts of the taking on Covered Species; (7) recommendations on how itigation measures might be changed to more effectively minimize take and mitigate the impacts of	ditional timeline of deliverables for installation of monitoring stations, and a cost estimate shall be eletermined in coordination with CDFW, as applicable. Vinter-Run Chinook Salmon Protections. Within one year of obtaining a signed coordinated operational greement among the Permittee, DWR, and Reclamation, Permittee shall use best available science as proved by CDFW to analyze proposed operations, considering the operational agreement, and the proposed use of Reclamation's investment in Sites and requirements from any subsequent permits. The proposed operations do not result in a net decrease in average annual escapement, as compared to a no-Project scenario, using best available science. TOPERATIONS Intelligation Report. No later than forty-five days after completion of all mitigation measures, or nety days prior to the expiration of the ITP (whichever is sooner), Permittee shall provide CDFW with a linal Mitigation Report. The Designated Fisheries Biologist, or Designated Representative shall prepare the Final Mitigation Report which shall include, at a minimum: (1) a summary of all ASRs; (2) a copy of the table in this MMRP with notes showing when each of the mitigation measures was implemented; (3) I available information about Project related incidental take of the Covered Species; (4) information bout other Project impacts on the Covered Species; (5) beginning and ending dates of Covered ctivities; (6) an assessment of the effectiveness of the ITP Conditions of Approval in minimizing and llly mitigating Project impacts of the taking on Covered Species; (7) recommendations on how itigation measures might be changed to more effectively minimize take and mitigate the impacts of	dditional timeline of deliverables for installation of monitoring stations, and a cost estimate shall be elemined in coordination with CDFW, as applicable. Inter-Run Chinook Salmon Protections. Within one year of obtaining a signed coordinated operational greement among the Permittee, DWR, and Reclamation, Permittee shall use best available science as oproved by CDFW to analyze proposed operations, considering the operational agreement, and the roposed use of Reclamation's investment in Sites and requirements from any subsequent permits. ermittee shall demonstrate that proposed operations do not result in a net decrease in average annual scapement, as compared to a no-Project scenario, using best available science. **C-OPERATIONS** Inal Mitigation Report. No later than forty-five days after completion of all mitigation measures, or nety days prior to the expiration of the ITP (whichever is sooner), Permittee shall provide CDFW with a nety days prior to the expiration of the ITP (whichever is sooner), Permittee shall provide CDFW with a nety days prior to the expiration of the ITP (whichever is sooner), a summary of all ASRs; (2) a copy of the table in this MMRP with notes showing when each of the mitigation measures was implemented; (3) I available information about Project related incidental take of the Covered Species; (4) information out other Project impacts on the Covered Species; (5) beginning and ending dates of Covered civities; (6) an assessment of the effectiveness of the ITP Conditions of Approval in minimizing and ally mitigating Project impacts of the taking on Covered Species; (7) recommendations on how litigation measures might be changed to more effectively minimize take and mitigate the impacts of	diditional timeline of deliverables for installation of monitoring stations, and a cost estimate shall be etermined in coordination with CDFW, as applicable. Inter-Run Chinook Salmon Protections. Within one year of obtaining a signed coordinated operational greement among the Permittee, DWR, and Reclamation, Permittee shall use best available science as oproved by CDFW to analyze proposed operations, considering the operational agreement, and the roposed use of Reclamation's investment in Sites and requirements from any subsequent permits. ermittee shall demonstrate that proposed operations do not result in a net decrease in average annual scapement, as compared to a no-Project scenario, using best available science. *-OPERATIONS **Inal Mitigation Report. No later than forty-five days after completion of all mitigation measures, or nety days prior to the expiration of the ITP (whichever is sooner), Permittee shall provide CDFW with a nety days prior to the expiration of the ITP (whichever is sooner), Permittee shall prepare to Final Mitigation Report. The Designated Fisheries Biologist, or Designated Representative shall prepare in Final Mitigation Report which shall include, at a minimum: (1) a summary of all ASRs; (2) a copy of the tability of the expiration of the expiration of the term of the ITP available information about Project related incidental take of the Covered Species; (4) information about Project related incidental take of the Covered Species; (6) beginning and ending dates of Covered Covered Covered Species; (6) beginning and ending dates of Covered Covered Species; (7) recommendations on how litigation measures might be changed to more effectively minimize take and mitigate the impacts of

APPENDIX I

Table 5. Covered Species Impacts, Compensatory Mitigation, and Cost Estimates

Covered Species and Habitat Type	Impact (acres)	Ratio (Impact to Mitigation)	Mitigation (acres)	Mitigation Cost/Acre	Cumulative Cost	
LFS/DS - Tidal habitat (Delta)	13.2	1	13.2	\$300,000.00 per acre	\$3,960,000.00	
CHNWR - Riparian/off- channel rearing habitat	178	1	178	\$181,094.00 per acre	\$32,234,732.00	
CHNWR - Riparian/wetland bench	4.6	1	4.6	\$181,094.00 per acre	\$833,032.00	
CHNSR - Riparian/off- channel rearing habitat	178	1	178	\$181,094.00 per acre	\$32,234,732.00	
CHNSR - Riparian/wetland bench	4.6	1	4.6	\$181,094.00 per acre	\$833,032.00	
Sub-Total	-	-	-	-	\$70,095,528.00	
Startup, Management, and Transaction Costs (Condition 10.3 – Cost Estimate)	n/a	n/a	n/a	n/a	\$39,355,270.00	
Covered Species Monitoring	n/a	n/a	n/a	Annual Cost = \$1,000,000.00	\$15,000,000.00 (15 years)	
Sub-Total	-	-	-	-	\$124,450,798.00	
White Sturgeon Spawning Area Supplementation	n/a	n/a	n/a	\$469,556.00 per acre	\$5,634,672.00	
Total	-	-	-	-	\$130,085,470.00	

Sites Reservoir

Project

ITP Number(s): 2081-2023-051-00



SUBMIT EACH RESUME AS A SEPARATE DOCUMENT

Number of Resumes	Included in Transmittal:
--------------------------	--------------------------

Name	Requested Role(s) ¹	Species/Resource(s)

¹ Requested roles correspond to the biological staffing requirements indicated in the Lake and Streambed Alteration (LSA) Agreement or California Endangered Species Act Incidental Take Permit (ITP). Roles may include a "Qualified Biologist" or "Designated Biologist" with the necessary experience to survey for special status species, or a "Biological Monitor" with the necessary experience to monitor construction activities for special status species. An individual may request more than one role.

Sites Reservoir

Project

LSA Agreement/ITP Number(s): 2081-2023-051-00



This form requests information about the qualifications of the Qualified Biologist, Designated Biologist and Biological Monitor specified in California Endangered Species Act Incidental Take Permits (ITP) and Lake or Streambed Alteration (LSA) Agreements issued by California Department of Fish and Wildlife (CDFW).

Completing this form will ensure the receipt of adequate information and <u>expedite</u> CDFW review of qualifications.

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Name:			Title:						
Company Name &			Phone:						
Address:			Email:						
SECTION II. EDUCATION									
College/University & Related to Natural Re									
Other Relevant Work	shops & Training:								
SECTION III. ROLE(S) AND PERMIT REQUIREMENTS									
Requested Role(s):									
Relevant LSA Agreem Measures or ITP Cond									
SECTION IV. SPECIES AND RESOURCE EXPERIENCE – <u>SUMMARY</u>									

This section summarizes experience by special status species and other resource. Use one row for each species or other resource where surveys or special protections are required in the CESA ITP or LSA Agreement <u>for which biologist approval is requested</u>. ³ If more space is needed, add rows to this table. Provide details in Section 5.

Species or Resource	Number of Field Seasons & Hours, Life Stages Observed Provide project details in Section 5	Life History Knowledge Describe formal workshops & training with dates, or informal training details	CDFW SCP, MOU, & USFWS 10a1a Authorization Number & Authorized Activities This form does not fulfill SCP, MOU, & USFWS 10a1a reporting requirements			
Insert Species or Resource 1	Field seasons: Hours: Life Stages:			Issued to: Expiration: Agency contact:		
Insert Species or Resource 2	Field seasons: Hours: Life Stages:			Issued to: Expiration: Agency contact:		

Biologist Resume Form 1 8/13/2021

² List all measures and conditions from the LSA Agreement or ITP requiring biological staff (i.e., Qualified Biologist, Designated Biologist, or Biological Monitor).

³ Often LSA Agreements/ITPs require surveys and other protections for multiple species and other resources. Include only those for which the biologist has experience and is requesting approval.

Sites Reservoir

Project

Insert Species or Resource 3	Field seasons: Hours:		Issued to: Expiration:
	Life Stages:		Agency contact:

Sites Reservoir

Project

LSA Agreement/ITP Number(s): 2081-2023-051-00

SECTION V. SPECIES AND RESOURCE EXPERIENCE – <u>DETAILS</u>

This section details experience from the <u>three</u> most recent and relevant projects for each species and resource identified in Section 4. If more space is needed, attach additional pages in the same table format (i.e., copy/paste format).

A. Species or Resource:			
Project 1 Name & Location:		Project Start & End Dates:	
LSA Agreement, ITP, or Other Agency Permit Number:		Role(s) ⁴ :	
Survey Type(s) ⁵ :		Construction Monitoring ⁶ :	Days: Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB ⁷ (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			
CDFW and Other Agency Email:			
Project 2 Name & Location:		Project Start & End Dates:	
LSA Agreement, ITP, or Other Agency Permit Number:		Role(s):	
Survey Type(s):		Construction Monitoring:	Days: Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			
CDFW and Other Agency Email:			
Project 3 Name & Location:		Project Start & End Dates:	
LSA Agreement, ITP, or Other Agency Permit Number:		Role(s):	

Biologist Resume Form 3 8/13/2021

⁴ Insert the role as described in the associated LSA Agreement, ITP or other agency permit. If these permits were not issued, describe the role based on the duties, e.g., "lead biologist with handling authorization" or "biological monitor."

⁵ For example, pre-construction survey or description of the protocol or guideline followed.

⁶ Include the number of days and describe the types of activities monitored (e.g., heavy equipment operation).

⁷ CNDDB is the abbreviation for California Natural Diversity Database.

Sites Reservoir

Project

Survey Type(s):		Construction	Days:
		Monitoring:	Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			
CDFW and Other Agency Email:			
Additional Information:			
B. Species or Resource:			
Project 1 Name & Location:		Project Start & End Dates:	
LSA Agreement, ITP, or Other Agency Permit Number:		Role(s):	
Survey Type(s):		Construction Monitoring:	Days: Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			
CDFW and Other Agency Email:			
Project 2 Name & Location:		Project Start & End Dates:	
LSA Agreement, ITP, or Other Agency Permit Number:		Role(s):	
Survey Type(s):		Construction Monitoring:	Days: Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			
CDFW and Other Agency Email:			
Project 3 Name & Location:		Project Start & End Dates:	

Sites Reservoir

Project

LSA Agreement, ITP, or Other Agency Permit Number:		Role(s):	
Survey Type(s):		Construction Monitoring:	Days: Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			,
CDFW and Other Agency Email:			
Additional Information:			
C. Species or Resource:			
Project 1 Name & Location:		Project Start & End Dates:	
LSA Agreement, ITP, or Other Agency Permit Number:		Role(s):	
Survey Type(s):		Construction Monitoring:	Days: Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			
CDFW and Other Agency Email:			
Project 2 Name & Location:		Project Start & End Dates:	
LSA Agreement, ITP, or Other Agency Permit Number:		Role(s):	
Survey Type(s):		Construction Monitoring:	Days: Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			,
CDFW and Other Agency Email:			

Sites Reservoir

Project

Project 3 Name & Location:		Project Start & End Dates:	
LSA Agreement, ITP, or Other Agency Permit Number:		Role(s):	
Survey Type(s):		Construction	Days:
		Monitoring:	Activities:
Species Life Stages Observed & Handled, Number of Each:	Life Stage: Number Observed: Number Handled: Reported to CNDDB (Y/N):	Company Name, Professional Reference Name, Phone, Email:	
If <u>not</u> reported to CNDDB, why:			
CDFW and Other Agency Email:			
Additional Information:			

[Financial institution letterhead]

IRREVOCABLE STANDBY LETTER OF CREDIT NO. [number issued by financial institution]

Issue Date: [date]

Beneficiary:

California Department of Fish and Wildlife Habitat Conservation Planning Branch 960 Riverside Parkway, Suite 90 West Sacramento, CA 95605 Attn: HCPB Mitigation Funds

Amount: U.S. \$[dollar number] [(dollar amount)]

Expiry: [Date] at our counters

Dear Sirs:

- At the request and on the instruction of our customer, [name of applicant]
 ("Applicant"), we, [name of financial institution] ("Issuer"), hereby establish in
 favor of the beneficiary, the California Department of Fish and Wildlife ("CDFW"),
 this irrevocable standby letter of credit ("Credit") in the principal sum of U.S.
 \$[dollar number] [(dollar amount)] ("Principal Sum").
- We are informed this Credit is and has been established for the benefit of CDFW pursuant to the terms of the incidental take permit for the [name of project] issued by CDFW to the Applicant on [date] (No. [number]) ("Permit").
- We are further informed that pursuant to the Permit, the Applicant has agreed to complete certain mitigation requirements in the Permit ("Mitigation Requirements").
- 4. We are finally informed that this Credit is intended by CDFW and the Applicant to serve as a security device for the performance by the Applicant of the Mitigation Requirements.
- 5. CDFW shall be entitled to draw upon this Credit only by presentation of a duly executed Certificate for Drawing ("Certificate") in the same form as Attachment A,

- which is attached hereto, at our office located at [name and address of financial institution].
- 6. The Certificate shall be completed and signed by an Authorized Representative of CDFW as defined in paragraph 12 below. Presentation by CDFW of a completed Certificate may be made in person or by registered mail, return receipt requested, or by overnight courier.
- Upon presentation of a duly executed Certificate as above provided, payment shall be made to CDFW, or to the account of CDFW, in immediately available funds, as CDFW shall specify.
- 8. If a demand for payment does not conform to the terms and conditions of this Credit, we shall give CDFW prompt notice that the demand for payment was not effected in accordance with the terms and conditions of this Credit, state the reasons therefore, and await further instruction.
- 9. Upon being notified that the demand for payment was not effected in conformity with the Credit, CDFW may correct any such non-conforming demand for payment under the terms and conditions stated herein.
- 10. All drawings under this Credit shall be paid with our funds. Each drawing honored by us hereunder shall reduce, *pro tanto*, the Principal Sum. By paying to CDFW an amount demanded in accordance herewith, we make no representations as to the correctness of the amount demanded.
- 11. This Credit will be cancelled upon receipt by us of Certificate of Cancellation, which: (i) shall be in the form of Attachment B, which is attached hereto, and (ii) shall be completed and signed by an Authorized Representative of CDFW, as defined in paragraph 12 below.
- 12. An Authorized Representative shall mean the Director of CDFW; the General Counsel of CDFW; a Regional Manager of CDFW; or the Branch Manager of CDFW's Habitat Conservation Planning Branch.
- 13. This Credit shall be automatically extended without amendment for additional periods of one year from the present or any future expiration date hereof, unless at least sixty (60) days prior to any such date, we notify CDFW in writing by registered mail, return receipt requested, or by overnight courier that we elect not to consider this Credit extended for any such period.
- 14. Communications with respect to this Credit shall be in writing and addressed to us at [name and address of financial institution], specifically referring upon such writing to this credit by number. The address for notices with respect to this Credit shall be: (i) for CDFW: Department of Fish and Wildlife, Habitat Conservation Planning Branch, 960 Riverside Parkway, Suite 90, West

Sacramento, CA 95605, Attn: HCPB Mitigation Funds; and (ii) for the Applicant: [name and address of applicant].

- 15. This Credit may not be transferred.
- 16. This Credit is subject to the International Standby Practices 1998 ("ISP 98"). As to matters not covered by the ISP 98 and to the extent not inconsistent with the ISP 98, this credit shall be governed by and construed in accordance with the Uniform Commercial Code. Article 5 of the State of California.
- 17. This Credit shall, if not canceled, expire on [expiration date], or any extended expiration date.
- 18. We hereby agree with CDFW that documents presented in compliance with the terms of this Credit will be duly honored upon presentation, as specified herein.
- 19. This Credit sets forth in full the terms of our undertaking. Such undertaking shall not in any way be modified, amended or amplified by reference to any document or instrument referred to herein or in which this Credit is referred to or to which this Credit relates and any such reference shall not be deemed to incorporate herein by reference any document or instrument.

[Name of financial institution]

By:		_
Name:	 	
Title:		_
Telephone:		

ATTACHMENT A

CERTIFICATE FOR DRAWING

[CDFW Letterhead]

[Date]

[Name and address of financial institution]

Re: Irrevocable Standby Letter of Credit No. [number issued by financial institution]

The undersigned, a duly Authorized Representative of the California Department of Fish and Wildlife ("CDFW"), as defined in paragraph 12 in the above-referenced standby letter of credit ("Credit"), hereby certifies to the Issuer that:

- 1. [Insert one of the following statements: "In the opinion of CDFW, the Applicant has failed to complete the Mitigation Requirements referenced in paragraph 3 of the Credit." or "As set forth in paragraph 13, the Issuer has informed CDFW that the Credit will not be extended and the Applicant has not provided CDFW with an equivalent security approved by CDFW to replace the Credit."]
- 2. The undersigned is authorized under the terms of the Credit to present this Certificate as the sole means of demanding payment on the Credit.
- CDFW is therefore making a drawing under the Credit in amount of U.S.\$______.
- 4. The amount demanded does not exceed the Principal Sum of the Credit.

Therefore, CDFW has executed and delivered this Certificate as of this ____day of [month], [year].

CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE

[Insert one of the following: "Director" or "General Counsel" or "Regional Manager, [Name of Regional Office]" or "Branch Manager, Habitat Conservation Planning Branch"]

ATTACHMENT B

CERTIFICATE FOR CANCELLATION

[CDFW Letterhead]

[Date]

[Name and address of financial institution]

Re: Irrevocable Standby Letter of Credit No. [number issued by financial institution]

The undersigned, a duly Authorized Representative of the California Department of Fish and Wildlife ("CDFW"), as defined in the paragraph 12 in the above-referenced Irrevocable Standby Letter of Credit ("Credit"), hereby certifies to the Issuer that:

- 1. [Insert one of the following statements: "The Applicant has presented documentary evidence of full compliance with the Mitigation Requirements referenced in paragraph 3 of the Credit." or "The Applicant has provided CDFW with an equivalent security approved by CDFW to replace the Credit."]
- 2. CDFW therefore requests the cancellation of the Credit.

Therefore, CDFW has executed and delivered this Certificate for Cancellation as of this ____ day of [*month*], [*year*].

CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE

[Insert one of the following: "Director" or "General Counsel" or "Regional Manager, [Name of Regional Office]" or "Branch Manager, Habitat Conservation Planning Branch"]

[Financial institution letterhead]

IRREVOCABLE STANDBY LETTER OF CREDIT NO. [number issued by financial institution]

Issue Date: [date]

Beneficiary:

California Department of Fish and Wildlife Habitat Conservation Planning Branch 960 Riverside Parkway, Suite 90 West Sacramento, CA 95605 Attn: HCPB Mitigation Funds

Amount: U.S. \$[dollar number] [(dollar amount)]

Expiry: [**Date**] at our counters

Dear Sirs:

- 1. At the request and on the instruction of our customer, [name of applicant] ("Applicant"), we, [name of financial institution] ("Issuer"), hereby establish in favor of the beneficiary, the California Department of Fish and Wildlife ("CDFW"), this irrevocable standby letter of credit ("Credit") in the principal sum of U.S. \$[dollar number] [(dollar amount)] ("Principal Sum").
- 2. We are informed this Credit is and has been established for the benefit of CDFW pursuant to the terms of the incidental take permit for the [*name of project*] issued by CDFW to the Applicant on [*date*] (No. [*number*]) ("Permit").
- 3. We are further informed that pursuant to the Permit, the Applicant has agreed to complete certain mitigation requirements, as set forth in conditions [*numbers*] in the Permit ("Mitigation Requirements").
- 4. We are finally informed that this Credit is intended by CDFW and the Applicant to serve as a security device for the performance by the Applicant of the Mitigation Requirements.
- 5. CDFW shall be entitled to draw upon this Credit only by presentation of a duly executed Certificate for Drawing ("Certificate") in the same form as Attachment A, which is attached hereto, at our office located at [name and address of financial institution].

LOC Template for CESA Security - Reduction Rev. 3/18/2024

- 6. The Certificate shall be completed and signed by an Authorized Representative of CDFW as defined in paragraph 12 below. Presentation by CDFW of a completed Certificate may be made in person or by registered mail, return receipt requested, or by overnight courier.
- 7. Upon presentation of a duly executed Certificate as above provided, payment shall be made to CDFW, or to the account of CDFW, in immediately available funds, as CDFW shall specify.
- 8. If a demand for payment does not conform to the terms and conditions of this Credit, we shall give CDFW prompt notice that the demand for payment was not effected in accordance with the terms and conditions of this Credit, state the reasons therefore, and await further instruction.
- 9. Upon being notified that the demand for payment was not effected in conformity with the Credit, CDFW may correct any such non-conforming demand for payment under the terms and conditions stated herein.
- 10. All drawings under this Credit shall be paid with our funds. Each drawing honored by us hereunder shall reduce, *pro tanto*, the Principal Sum. By paying to CDFW an amount demanded in accordance herewith, we make no representations as to the correctness of the amount demanded.
- 11. This Credit will be cancelled or the Principal Sum will be reduced upon receipt by us of Certificate of Cancellation/Reduction, which: (i) shall be in the form of Attachment B, which is attached hereto, and (ii) shall be completed and signed by an Authorized Representative of CDFW, as defined in paragraph 12 below.
- 12. An Authorized Representative shall mean the Director of CDFW; the General Counsel of CDFW; a Regional Manager of CDFW; or the Branch Manager of CDFW's Habitat Conservation Planning Branch.
- 13. This Credit shall be automatically extended without amendment for additional periods of one year from the present or any future expiration date hereof, unless at least sixty (60) days prior to any such date, we notify CDFW in writing by registered mail, return receipt requested, or by overnight courier that we elect not to consider this Credit extended for any such period.
- 14. Communications with respect to this Credit shall be in writing and addressed to us at [name and address of financial institution], specifically referring upon such writing to this credit by number. The address for notices with respect to this Credit shall be: (i) for CDFW: Department of Fish and Wildlife, Habitat Conservation Planning Branch, 960 Riverside Parkway, Suite 90, West Sacramento, CA 95605, Attn: HCPB Mitigation Funds; and (ii) for the Applicant: [name and address of applicant].

LOC Template for CESA Security - Reduction Rev. 3/18/2024

- 15. This Credit may not be transferred.
- 16. This Credit is subject to the International Standby Practices 1998 ("ISP 98"). As to matters not covered by the ISP 98 and to the extent not inconsistent with the ISP 98, this credit shall be governed by and construed in accordance with the Uniform Commercial Code, Article 5 of the State of California.
- 17. This Credit shall, if not canceled, expire on [expiration date], or any extended expiration date.
- 18. We hereby agree with CDFW that documents presented in compliance with the terms of this Credit will be duly honored upon presentation, as specified herein.
- 19. This Credit sets forth in full the terms of our undertaking. Such undertaking shall not in any way be modified, amended or amplified by reference to any document or instrument referred to herein or in which this Credit is referred to or to which this Credit relates and any such reference shall not be deemed to incorporate herein by reference any document or instrument.

[Name of financial institution]

Зу:		_
Vame:	 	
Гitle:		
Telephone: _		

ATTACHMENT A

CERTIFICATE FOR DRAWING

[CDFW Letterhead]

[Date]

[Name and address of financial institution]

Re: Irrevocable Standby Letter of Credit No. [number issued by financial institution]

The undersigned, a duly Authorized Representative of the California Department of Fish and Wildlife ("CDFW"), as defined in paragraph 12 of the above-referenced standby letter of credit ("Credit"), hereby certifies to the Issuer that:

- 1. [Insert one of the following statements: "In the opinion of CDFW, the Applicant has failed to complete the Mitigation Requirements referenced in paragraph 3 of the Credit." or "As set forth in paragraph 13, the Issuer has informed CDFW that the Credit will not be extended and the Applicant has not provided CDFW with an equivalent security approved by CDFW to replace the Credit."]
- 2. The undersigned is authorized under the terms of the Credit to present this Certificate as the sole means of demanding payment on the Credit.
- CDFW is therefore making a drawing under the Credit in amount of U.S.
 \$______.
- 4. The amount demanded does not exceed the Principal Sum of the Credit.

Therefore, CDFW has executed and delivered this certificate as of this ____day of [month], [year].

CALIFORNIA DEPARTMENT OF FISH AND WILDLIFE

[Insert one of the following: "Director" or "General Counsel" or "Regional Manager, [Name of Regional Office]" or "Branch Manager, Habitat Conservation Planning Branch"]

ATTACHMENT B

CERTIFICATE FOR CANCELLATION/REDUCTION

[Date]

[Name and address of financial institution]

Re: Irrevocable Standby Letter of Credit No. [number issued by financial institution]

The undersigned, a duly Authorized Representative of the California Department of Fish and Wildlife ("CDFW"), as defined in the paragraph 12 in the above-referenced Irrevocable Standby Letter of Credit ("Credit"), hereby certifies to the Issuer that:

1. [Insert one of the following statements: "The Applicant has presented documentary evidence of full compliance with the Mitigation Requirements referenced in paragraph 3 of the Credit." or "The Applicant has presented documentary evidence of compliance with the following Mitigation Requirement[(s)] referenced in paragraph 3 of the Credit: [insert brief description of requirement(s) or requirement number(s) completed]." or "The Applicant has provided CDFW with an equivalent security approved by CDFW to replace the Credit."]

02 to replace and ordain. 1	
2. [Insert one of the following statements cancellation of the Credit." or "CDFW the Principal Sum in the amount of \$"]	refore requests a reduction in the
Therefore, CDFW has executed and delivered th [<i>month</i>], [<i>year</i>].	is certificate as of this day of
CALIFORNIA DEPARTMENT OF FISH AND WI	LDLIFE
[Insert one of the following: "Director" or "Gen [Name of Regional Office]" or "Branch Manage Branch"	

State of California - Department of Fish and Wildlife **MITIGATION PAYMENT TRANSMITTAL FORM** DFW 1057 (REV.05/18/21)

Project Applicant Instructions: Please fill out and attach this form to payment. For conservation banks, also attach the Bill(s) of Sale for credits sold. One form may be used for multiple transactions, BUT YOU MUST USE A SEPARATE FORM FOR EACH CHECK YOU TRANSMIT. Make sure to include Project Name, Project Tracking Number, and ASB Mitigation Tracking Number (if available) on the attached payment type.

1. DATE:	2. FROM: Name	
TO:	INATHE	
Regional Manager	Mailing Address	
Region Office Address	City, State, Zip	
	Telephone Number/FAX Number	
3. RE: Project Name as appears on permit/agreement	t	
4. AGREEMENT/ACCOUNT INFORMATION: (check the ag	pplicable type)	
□ 2081 Permit □ Conservation Bank □ 2835 NC		
Project Tracking Number		
5. PAYMENT TYPE (One check per form only): The following	ring funds are being remitted in connection with the above referenced project:	
Check information:		
Total \$ Chec	ck No	
Account No Bank	Routing No	
a. Endowment: for Long-Term Management	Subtotal \$	
b. Habitat Enhancement	Subtotal \$	
c. Security:		
Cash Refundable Security	y Deposit Subtotal \$	
2. Letter of Credit	Subtotal \$	
1. Financial Institution:		
2. Letter of Credit Numb	ber:	
3. Date of Expiration:		
ACCOUNTING OFFICE USE ONLY		
Description	FI\$Cal Coding	
Speedchart (Project, Program, Reference, Fund)		
Reporting Structure		
Category		

Please send this form to asbmitigation@wildlife.ca.gov

Date Established: ___