February 29, 2012

Dr. Gerald Meral
Deputy Secretary
California Natural Resources Agency
1416 Ninth St, Suite #1311
Sacramento, CA 95814

RE: BDCP Conveyance Impacts on Local Delta Communities

Dear Dr. Meral:

This letter responds to recent meetings with local stakeholders and your subsequent request for feedback regarding the preferred location of the 1,200-acre, (approximately two square mile) Intermediate Forebay proposed as part of the Bay Delta Conservation Plan (“BDCP”) conveyance system to divert water from the Sacramento River. This discussion arose in part from the initial location of the Intermediate Forebay proposed in March 2010 adjacent to Stone Lakes National Wildlife Refuge (“Stone Lakes Refuge”) and partially within Reclamation District 813, and the later relocation of the
Forebay slightly to the southwest in October 2010 to the Pearson District (also known as Reclamation District 551), just south of the town of Courtland. Local Agencies of the North Delta and the undersigned local stakeholders and environmental organizations agree on the points discussed below. For information about each of the signatories to this letter please see Attachment A.

1. **The area adjacent to Hood and Courtland on the Sacramento River where the BDCP proposes to place massive intakes, a forebay and associated facilities includes vibrant rural communities, historic features, productive and sustainable multi-generational farms, and one-of-a-kind habitat for special status species protected by state, federal and international law.**

- Courtland and Hood are historic legacy communities with a significant and distinct cultural heritage that the Legislature has declared must be protected. (See Pub Resources Code, § 29703, subd. (a).)

- Delta agriculture is unique with abundant sustainable local water supplies, productive soils, innovative production techniques, wildlife-supporting crops, and with extensive local markets minimizing transportation impacts. (See Pub. Resources Code, § 29708.) Agriculture is far and away the largest employer and income producer near Courtland and Hood, and local farms are a crucial part of the over $5 billion dollar a year agricultural economy of the greater Delta.1

- The adjacent Stone Lakes Refuge, in the heart of the Central Valley along the Pacific Flyway, is home to over 200 species of birds as well as numerous fish and wildlife species. Farming (including crops such as alfalfa, wheat and corn) is an integral part of the habitat network anchored by the Refuge, providing habitat for species such as the Swainson’s hawk, the greater sandhill crane and many other migratory birds. (Please see Attachment B for photographs of some species that depend on the Refuge and surrounding farmlands.) Without the roosting, cover, and forage provided by the surrounding farms, the Refuge would support far less wildlife.

- Of the 556 national wildlife refuges, Stone Lakes Refuge is one of only a handful in an urban area. As such, Stone Lakes Refuge is an outdoor

---

classroom for thousands of schoolchildren each year. Due to development encroaching from the north and east, in 2005 Stone Lakes Refuge was designated as one of the six most threatened refuges in the nation.²

- Given that the BDCP is ostensibly a plan to conserve habitat, it is disconcerting that the process to date has largely ignored the adverse effects of the proposed forebay and pumping facilities. The habitat values of Stone Lakes Refuge and surrounding farmland, not to mention the decades of substantial Federal and State investment in the creation and management of the Refuge itself. BDCP planning staff have used only general maps and have a limited understanding of the actual proposed facility locations, so we are providing a diagram to show how the area would be impacted by the proposed forebay and pumping facilities during construction and operation of the project. (See Attachment C, showing BDCP proposed intake and forebay locations in relation to Stone Lakes Refuge and surrounding farmlands.)

2. Due to its unique historical, cultural, economic, agricultural and environmental values, the local area has no suitable location for a two-square-mile Intermediate Forebay (ring dam) or any of the associated conveyance and storage facilities, including the 5 intakes for a 15,000 cfs capacity system and powerline infrastructure. All locations for such a massive forebay and the associated facilities would have unacceptable impacts on local communities, productive agriculture, important wildlife habitat and other environmental resources.

- The proposed Intermediate Forebay would adversely impact the adjacent communities through condemnation and permanent destruction of homes, cultural and historic resources, and the productive farmland that is the backbone of the local economy, leading to unemployment for local workers and direct impacts to the few local businesses that serve the farming community. There would also be massive construction impacts from the extraction and transport of hundreds of thousands of cubic yards of fill material for the levees and embankments, fragmentation of farms and agricultural and reclamation district drainage and irrigation facilities, increased seepage that will raise the local water table and damage crops and increase energy demand for pumps, obstructions caused by powerlines, and

---

The intake facilities themselves could also increase hydraulic impacts and resulting erosion along the waterside toe of the levees that protect lives and property by removing almost half of the flow of the Sacramento River at during some periods. Moreover, local water quality would be degraded through increased brackish water intrusion from downriver.

- The BDCP’s obvious construction and operational impacts on local infrastructure continue to be ignored in the planning and design process, and basic engineering principles have not been applied to properly solve technical problems such as drainage and seepage. In particular, DWR Bulletin 125 must be used by BDCP to assess seepage potential, and interference with district drainage facilities. The currently proposed Intermediate Forebay is a two square mile ring dam created in the middle of a geographic depression on unstable soils. If the dam were to fail on any point of its perimeter, it would literally scour the community away since it would be on the “dry” side of the Sacramento River levee. The soils have been documented by DWR to allow water movement laterally and seep upwards to the surface in adjacent and nearby lands. If the forebay is unlined it has the likelihood of saturating local soil conditions, impacting farming, and reducing house and school stability. Resistance to lining the Intermediate Forebay is just one example of the shortsightedness of DWR and the lack of understanding of local conditions. The BDCP would also significantly impact the small capacity local roads and interfere with their use by the local community and for the movement of agricultural goods, school busses, and emergency vehicle access (such as police, ambulance, fire, and district flood watch and response vehicles), etc.

- The Bates Elementary School would be literally in the shadow of the massive unlined three-story Intermediate Forebay, proposed for the Pearson District. Placing a giant artificial lake above a school would pose flooding risks as well as destroy the rural community that now surrounds the school. It would further permanently destroy the historic viewsheid.

- Local farmers and Stone Lakes Refuge work together to provide roosting and foraging habitat for a variety of state and federally listed bird species. The destruction of habitat by the proposed new borrow areas, and the direct and indirect impacts on the Refuge and the local agricultural base would irreparably harm listed bird species. Finally the exchange of productive farmland for giant barren levees, a large artificial lake, powerlines, new roads, and cleared right of ways would eliminate habitat that simply cannot
be replaced or otherwise be mitigated. This unique network of interwoven protected land and farmland habitat should be fostered, not undercut.

- While the BDCP proposes to eliminate foraging habitat adjacent to the Stone Lakes Refuge boundary, the City of Elk Grove proposes to grow to the southwest, thereby converting important foraging habitat on the west side of the Stone Lakes Refuge. The expansion of Elk Grove together with the BDCP tunnel would greatly reduce the ecological values now provided by the areas surrounding the Stone Lakes Refuge.

3. Alternatives are available that would have less severe impacts on Delta communities, farms and habitat. In particular, the Western Delta Intake Concept (“WDIC”) provides a promising option that would locate a similar-scaled intake on primarily publicly owned land in the Western Delta, thereby facilitating more natural freshwater flows through the Delta that the BDCP allegedly supports. In addition, conveyance of water through the Delta will continue to be a necessary part of the Central Valley Project and State Water Project, and should be improved.

- Dr. Robert Pyke and others have proposed a variety of alternative approaches to providing a more reliable water supply that would ensure the BDCP would not critically harm legacy communities, productive agriculture, and already imperiled habitat. The WDIC, whereby intakes would be located on the largely state-owned Sherman Island, appears to have these beneficial features, as well as others, that would better meet the coequal goals and have a foundation of public support. The WDIC is not to be confused with the BDCP’s Western Alignment, which simply transfers the project impacts from one side of the Sacramento River to the other, essentially destroying Reclamation District 150.

- The BDCP fails to recognize and justify an approach that trades off some listed species for others to deliver more water out of the basin. The initial indications of the WDIC alternative demonstrate that there is simply no need for disruptive and costly large-scale fisheries habitat creation that would harm the Delta’s agricultural economy as well as eliminate important upland habitat areas, and is nevertheless unlikely to recover target species.

- The WDIC alternative provides opportunity for large-scale water diversion during high flow periods without disrupting natural flow patterns.
• Because of its position at the bottom of the Delta, the WDIC alternative is also more likely to receive water right permits as it would not harm other legal users of water in the system, including the thousands of water right holders upstream from the existing Central Valley Project and State Water Project diversions in the South Delta.

• Through Delta conveyance, how water is currently conveyed to State Water Project and Central Valley Project pumps, will continue to be relied upon during the decade or more of construction for the proposed tunnel, and would continue to be used even after new diversions are constructed. BDCP should include improvements to key levees to prevent potential disruptions in water supply and the South Delta intake facilities must be retrofitted with fish screens.

4. Any proposed BDCP diversions, conveyance and storage facilities planned for the North Delta, which the undersigned oppose for the reasons described in this letter (among others), must be designed first and foremost to avoid impacts in the first place, secondly to effectively mitigate those impact, and thirdly to provide some level of offsetting in-Delta benefit. Despite repeated requests for such a conceptual redesign and analysis, the BDCP has continued to propose the most socially and environmentally damaging proposal and simply rearranged the details when concerns were voiced regarding those impacts.

• Avoiding and minimizing impacts means a much smaller scale diversion facility with either no forebay or a much smaller forebay. Moreover, such facilities must be located on land already owned by the Department of Water Resources, and/or in locations where there are willing sellers, and be designed to avoid interference with the existing community, farming and wildlife uses of the area.

• Prior to any diversions in the North Delta, the BDCP must demonstrate with convincing evidence that the facilities can be feasibly operated in the long-term to achieve their project purposes while remaining in full compliance with the water quality mandates of the North Delta Water Agency’s 1981 Contract with the Department of Water Resources criteria that were designed to ensure suitable water quality for irrigation but that

---

3 DWR engineers have conceded that a forebay is not imperative, even if it would provide certain benefits in regulation of flow. Moreover, “head pressure” would be created by the depth, not the area, of the forebay in any case. Thus, there is flexibility on forebay size regardless of flow sizing.
also provide ancillary benefits for domestic use, freshwater flows for fish, wildlife and the environment. The BDCP must also avoid detrimental impacts to Delta channels or water users, including but not limited to the water elevation (stage) and seepage impacts prohibited by Section 6 of the NDWA Contract.

- Project design elements must avoid and minimize impacts. The BDCP has never provided any discussion of project design optimization, and instead simply focused on the biggest project possible to divert and export the greatest amount of water. The currently proposed footprint for unlined three-story ring dam (Intermediate Forebay) is approximately two square miles in area with 32-foot-tall levees. Not only is the off-the-shelf design for the embankments grossly oversized, it uses a massive footprint that wastes habitat and farmland, and devastates legacy communities. The BDCP has systematically failed to attempt to use modern engineering practices to develop a design which maintains the same level of safety while minimizing the impacts.

- Bird strikes from new transmission lines needed for the pumping facilities are a major local concern. Under the tunnel alternative, an approximately 230-kV interconnection line would run from I-5 through the center of the Stone Lakes Refuge boundary to supply power to pumping stations and the Intermediate Forebay. Power poles and associated power lines impact avian species by increasing the risk of electrocution and collisions by obstructing flight paths and exposing birds to hazardous perch sites.\(^4\) Large power lines present human health concerns as a result of Electro Magnetic Fields (“EMF”). The California Public Utility Commission mandates a review process to reduce EMFs produced by new powerlines.\(^5\) Thus, any new powerlines to serve BDCP facilities must be placed underground to reduce human, bird, and landscape impacts, as was done recently with a 230 kV powerline in Hillsborough.\(^6\)

---


\(^{5}\) See CPUC Decision 06-01-042 is available at http://docs.cpuc.ca.gov/PUBLISHED/FINAL_DECISION/53181.htm.

\(^{6}\) See CPUC Decision 04-08-046, available at http://docs.cpuc.ca.gov/published/FINAL_DECISION/39122.htm.
Conclusion

It should be clear from this letter that the BDCP project design proposals provided thus far fail to meet rudimentary standards for avoidance and minimization of impacts on the local community. The Northern Delta’s landowners, districts, community, and environmental interests stand together to say “NO” to the damage that the BDCP proposes to wreak on our communities, farms and wildlife. We will not give serious consideration to a project design that attempts to pit neighbor against neighbor and destroy what local communities have worked to create in the Delta. The undersigned urge the BDCP to move forward on project alternatives that both avoid detrimental impacts on our communities and also provide the sought water supply benefits, such as the WDIC alternative.

For further information regarding the issues discussed in this letter, please contact Osha Meserve at (916) 455-7300 or deltalandcoalition@gmail.com.

Sincerely,

Kenneth L. Pucci, Representative
Local Agencies of the North Delta

Russell Van Loben Sels, Chairman
Delta Caucus

Leda Huta, Executive Director
Endangered Species Coalition

Sean Wirth, Co-Chairman
Habitat 2020

Mark Prunner, President
North Delta C.A.R.E.S.

Ellen R. Carlson, President
Stone Lakes National Wildlife Refuge Association

Barbara Barrigan-Parrilla, Campaign Director
Restore the Delta
Assemblymember Kristin Olsen
Assemblymember Mariko Yamada

Phil Isenberg, Delta Stewardship Council
Michael Machado, Delta Protection Commission

Supervisor Mike McGowan, Yolo County
Supervisor Don Nottoli, Sacramento County
Supervisor Mary Nejedly Piepho, Contra Costa County
Supervisor Jim Provenza, Yolo County
Supervisor Mike Reagan, Solano County
Supervisor Larry Ruhstaller, San Joaquin County
Supervisor Ken Vogel, San Joaquin County

Greg Gartrell, Contra Costa Water District
Phil Harrington, City of Antioch
John Herrick, South Delta Water Agency
Dante Nomellini, Central Delta Water Agency
Melinda Terry, North Delta Water Agency

Gary Bobker, The Bay Institute
Kimberley Delfino, Defenders of Wildlife
Zeke Grader, Pacific Coast Federation of Fishermen’s Associations
Cynthia Kohler, Environmental Defense Fund
Jonas Minton, Planning and Conservation League
Barry Nelson, National Resources Defense Fund
Ron Stork, Friends of the River
ATTACHMENT A

LOCAL AGENCIES OF THE NORTH DELTA

LAND is a collaboration organized in 2009 focused on the interests of special districts with respect to public policy and regulatory changes in the Delta. LAND participants include: Reclamation Districts 3, 150, 307, 349, 551, 554, 755, 813, 999 and 1002, covering over 70,000 acres within the Delta. Some of these agencies provide both water delivery and drainage services, while others only provide drainage services. These districts also assist in the maintenance of the levees that provide flood protection to farms and local communities. For further information, contact: Osha R. Meserve at osha@semlawyers.com or at (916) 455-7300.

The Delta Caucus is comprised of the Contra Costa, Sacramento, San Joaquin, Solano and Yolo County Farm Bureaus. The Delta Caucus tracks and comments on issues of importance to agriculture in the Delta. For further information, contact: Katie Patterson at kpatterson@sjfb.org or (209) 931-4931.

The Endangered Species Coalition is a national network of hundreds of conservation, scientific, education, religious, sporting, outdoor recreation, business and community organizations working to protect our nation’s disappearing wildlife and last remaining wild places. For further information, contact: Mark Rockwell at mrockwell@stopextinction.org or (530) 432-0100.

Habitat 2020 is a coalition of environmental organizations collaborating on common issues in, and affecting, the Sacramento region, and acts as the Habitat Conservation Committee of ECOS – working to protect the lands and waters where our wildlife and native plants live in the Sacramento region. Members of Habitat 2020 include the Audubon Society, California Native Plant Society, Friends of Swainson's Hawk, Save the American River Association, Save Our Sandhill Cranes, the Sierra Club, Stone Lakes National Wildlife Refuge Association, and the Urban Creeks Council. For further information, contact: Matt Baker at habitat@ecosacramento.net or (916) 202-9093.

North Delta CARES (Community Area Residents for Environmental Stability) is a volunteer group of North Delta residents and farmers. For nearly 4 years, North Delta CARES has met together and engaged in the process to advocate for preservation and enhancement of the unique cultural, recreational, natural resource, and agricultural values of the Delta. For further information, contact: Mark Pruner at mark@markpruner.com or (916) 204-9097.

Based in Stockton, California, Restore the Delta works in the areas of public education and outreach so that all Californians recognize this region as part of California’s natural heritage, deserving of restoration. Restore the Delta advocates on behalf of local Delta stakeholders with government water agencies to ensure that water management decisions will protect and benefit local Delta communities. For further information, contact: Barbara Barrigan-Parrilla at Barbara@restorethedelta.org or (209) 479-2053.

Stone Lakes National Wildlife Refuge Association is a nonprofit public benefit corporation dedicated to the preservation, protection, enhancement, and promotion of the Stone Lakes National Wildlife Refuge. The Association works to provide a unique wildlife viewing experience for the enjoyment and educational benefit of the public while protecting and restoring critical habitat for special interest and endangered plant and animal species dependent upon the Pacific Flyway, the Sacramento-San Joaquin Delta, and the Central Valley’s complex web of permanent and seasonal wetlands, riparian forests, oak woodlands, and annual grasslands. For further information, contact: Rob Burness at rmburness@comcast.net or (916) 956-0362.
Photographs of Stone Lakes National Wildlife Refuge and Surrounding Farmland Habitat

DFG fully protected White-tailed Kite at SRCSD Bufferlands within Refuge – March 2009


Long-billed curlew in alfalfa field adjacent to Refuge – Feb. 2012

Sandhill cranes in wheat field

Snowy egret in Beach Lake wetland on Refuge – May 2011


Stone Lakes Refuge’s annual Walk on the Wildside Event – May 2011

Greater white-fronted geese on Refuge – Feb. 2012
Notes:
Developed from Materials Provided by the DWR 2009/2011/2012,
BDCP and DHCCP, reflecting the most recent proposal to date.
Base maps from Bing Aerials
Projection: NAD 1983, California Trans Albers

Legend
- Peripheral Canal
- Intake East/Intake Option
- Truck Hauling Routes
- DWR Proposed Tunnel (2012)
- Electrical Interconnection Line
- DWR Alternative Forebays, Three Options (2012)

BSK
Associates

ATTACHMENT C

PROPOSED ALIGNMENTS AND FOREBAYS
PLATE 1