

STATE OF CALIFORNIA
REGIONAL WATER QUALITY CONTROL BOARD
CENTRAL COAST REGION

SUPPLEMENTAL SHEET FOR REGULAR MEETING OF SEPTEMBER 7, 2006
Prepared on August 31, 2006

ITEM NUMBER: 6 & 7

SUBJECT: Response To Comments – Update on Moss Landing Power Plant and Pilot Desalination Projects

SUMMARY:

Central Coast Regional Water Quality Control (Water Board) staff received the following comment letters:

1. August 18, 2006 letter from Ms. Madeleine Clark of the Elkhorn Slough Coalition
2. August 22, 2006 letter from Matt Vander Sluis of the Planning and Conservation League, Conner Everts of the Desal Response Group, and Joe Geever of Surfrider Foundation
3. August 22, 2006 letter from Gordon Hensley of San Luis Obispo Coastkeeper
4. August 22, 2006 letter from Monterey Bay National Marine Sanctuary

These letters are attached.

COMMENTS FROM MS. MADELEINE CLARK OF THE ELKHORN SLOUGH COALITION

1) Comment: "The February 3, 2004 decision agreed with EPA rules mandating closed-cycle cooling as the national minimum technology for new power plants and said dry cooling is a type of such technology that would be acceptable. The court indicated that the minimum technology standard also would apply to existing plants."

Response: The February decision by the Second Circuit Court was for new power plants and the decision did not address existing power plants such as the one at Moss

Landing. The 316(b) regulations for existing power plant intakes are currently in litigation and a decision is expected in early 2007. Presently it is unclear what options will be available to power plant operators to comply with 316(b) regulations. As mentioned in the staff report, staff proposes to not reissue the Moss Landing Power Plant permit until the federal 316(b) lawsuit and the Voices of the Wetlands lawsuit are resolved.

2) Comment: "Preliminary findings and observations from the completed monitoring project of the Ecological Effects of the Moss Landing Thermal Discharge (www.mbnmssimon.org/sections/sandyFloor/project) show that in spite of statements to the contrary, thermal discharge has direct adverse environmental impacts on the ecosystem."

Response: Staff disagrees. Key findings of the above referenced report, by independent scientists from Moss Landing Marine Laboratories, include:

1. "There were no detectable significant impacts of the MLPP outfall on intertidal and shallow subtidal faunal communities."
2. "No negative impacts on seabird abundance and distribution as a direct result of the thermal plume were observed (e.g., no species were observed actively avoiding the thermal plume)."

COMMENTS FROM MATT VANDER SLUIS OF THE PLANNING AND CONSERVATION LEAGUE, CONNER EVERTS OF THE DESAL RESPONSE GROUP, AND JOE GEEVER OF SURFRIDER FOUNDATION

1) Comment: "The pilot desalination projects should not be granted NPDES permits at this time due to unresolved issues regarding multiple project alternatives."

Response: Regional Board staff is enrolling the two small pilot desalination projects in the Water Board's Low-Threat Permit based on water quality issues. Unresolved issues regarding multiple project alternatives are not within the Regional Board's jurisdiction. Also, Environmental Impact Reports for these projects will not be completed until after the pilot project results are in.

2) Comment: "Permits should not be granted until a careful study of the Impingement, Entrainment and Outfall Impacts from the Desalination Pilot Projects has been conducted."

Response: Water Board staff assessed the projected impacts of the pilot desalination projects. The Cal Am project will not cause impingement or entrainment because it uses once-through cooling water from the power plant. The short-term (one year) Cal Am pilot project will not extend the life of the power plant.

The Poseidon pilot project proposes to use the existing intake and outfall of the former National Refractories facility. Therefore, staff evaluated this pilot project separately from the existing power plant. Regional Board staff determined the potential impingement and entrainment impacts from the Poseidon pilot project to be negligible because the flow volume is very small (less than 0.29 million gallons per day).

3) Comment: "Permits for pilot desalination projects should only be given if it can be ascertained that variability in power plant operations will not affect the viability of ocean water desalination."

Response: The pilot desalination projects use minimal amounts of seawater; these are not full-scale desalination projects. We evaluate the pilot projects on their own merits, not on potential issues associated with full-scale projects.

COMMENTS FROM GORDON HENSLEY OF SAN LUIS OBISPO COASTKEEPER

1) Comment: "To the extent that both of these projects propose to co-locate with the outdated Moss Landing Power Plant, granting Low-Threat coverage would be inconsistent with SWRCB and State Lands policy statements that once through cooling, as used at MLPP, is not Best Available Technology."

Response: We disagree with Mr. Hensley's characterization of State Water Board and State Lands Commission Policy. The State Water Board "policy" is a draft only, and the current draft does not conclude that once through cooling at MLPP or elsewhere is not BAT. Section 316(b), the State Lands resolution and the draft State Water Board policy only apply to *cooling water* intake structures. Neither pilot project is proposed to use intake water for cooling. Also, as noted above, we evaluate the pilot projects based on their own merits.

2) Comment: "Approval of the proposed projects may have the unintended consequence of interfering with public interest in phasing out this method of power plant cooling."

Response: See response above to comment 1.

3) Comment: "Approval of Low-Threat status of the California American Water Company (Cal-Am) proposal is premature. The proposed Cal-Am project has yet to prepare an Environmental Impact Report as required as part of review currently underway by the California Public Utilities Commission. This EIR will include an examination of additional project alternatives, such as beach wells, that would make the pilot project before RWQCB3 moot. Alternatively, granting a Low-threat discharge permit prior to completion of the EIR analysis will likely

prejudice the EIR and ultimately interfere with the PUC process."

Response: Enrollment of the pilot projects under the low-threat permit is exempt from CEQA pursuant to Water Code Section 13389. Since there are no new source performance standards for desalination projects, these projects are not "new sources" under Section 13389. Even if CEQA required an EIR or other environmental study, the time for CEQA compliance was the adoption of the low-threat permit itself, not enrollment of projects under the permit.

4) Comment: "The likely impacts of these 2 pilot proposals cannot be approved in isolation from the multiple proposals around Monterey Bay. Approval of Low-Threat status for these 2 proposals avoids analysis of possible cumulative impacts to Elkhorn Slough, Monterey Bay, and near shore habitats."

Response: See response above to comment 3.

AUGUST 22, 2006 LETTER FROM MONTEREY BAY NATIONAL MARINE SANCTUARY

1) Comment: "Monitoring. Enrollment of these two pilot desalination projects under the General Permit for Discharges with Low Threat to Water Quality NPDES No. CAG993001 would require compliance with Monitoring and Reporting Program (MRP) No. 01-119. The MRP requires routing effluent and receiving water monitoring to verify compliance with the Order and protection of water quality. Although neither the MRP No. 01-119 nor the RWQCB staff summaries seem to identify the monitoring interval, we recommend that monitoring of these facilities occur on at least a quarterly basis. This is necessary to get an accurate depiction of seasonal variations."

Response: Monitoring and Reporting Program (MRP) No. 01-119 will be conditioned for the pilot desalination projects to incorporate monthly monitoring.

1) Comment: "Notifications. The regulations for the Monterey Bay National Marine Sanctuary at 15 CFR Part 922.132 prohibit discharges from within the boundaries of the MBNMS. Discharges occurring outside the MBNMS that subsequently enter and injure Sanctuary resources or qualities are similarly prohibited. In order to protect the health of the MBNMS, we request that the permittee immediately notify our office at 888-902-2778 for any spills that are likely to enter ocean waters. In addition to facilitating potential enforcement investigations, the MBNMS seeks to track this information in order to evaluate existing and direct the implementation of new management measures. All correspondence shall be sent to the individual listed below:

Permit Coordinator
Monterey Bay National Marine Sanctuary
299 Foam Street
Monterey, CA 93940"

Response: Staff has added a requirement to Monitoring and Reporting Program (MRP) No. 01-119, for the pilot desalination projects, to notify the MBNMS of spills and violations.

Attachments:

1. August 18, 2006 letter from Ms. Madeleine Clark of the Elkhorn Slough Coalition
2. August 22, 2006 letter from Matt Vander Sluis of the Planning and Conservation League, Conner Everts of the Desal Response Group, and Joe Geever of Surfrider Foundation
3. August 22, 2006 letter from Gordon Hensley of San Luis Obispo Coastkeeper
4. August 22, 2006 letter from Monterey Bay National Marine Sanctuary

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Dear Stakeholders and Interested Parties:

These attachments are our response to the Central Coast Regional Water Quality Control Board's staff report for the Public Hearing on Pilot Desal Permits to be held in Monterey (Monterey City Council Chambers, 598 Pacific Street, 3:00 p.m., Thursday, September 7, 2006.)

We are including the California State Lands Commission OTC Resolution (adopted April 17, 2006) and suggest you read it first to gain a clear understanding of coastal power plant once-through cooling and state policy regarding this antiquated technology. Legislators are formulating new law to eliminate once-through cooling. The California Oceans Protection Council, leadership in both parties and the governor support these efforts to protect valuable public marine resources, wetlands, tidal zones and the California coastline.

The Elkhorn Slough Coalition submission focuses on Monterey County Superior Court's ruling (rendered October 29, 2002) remanding the Moss Landing power plant discharge permit back to the Regional Water Board for further consideration.

We follow that with the U.S. Court of Appeals for the Second District directive to the EPA (February 3, 2004) regarding closed-cycle cooling versus habitat restoration as mitigation measures to offset impacts from once-through cooling.

Lastly, we submit as evidence, the impacts from the discharge site at the Moss Landing power plant as reported from studies conducted by NOAA and the Moss Landing Marine Lab. Several newspaper articles (attached to our hardcopy to the board) support our arguments.

We also included the NOAA/ CAL AM commentary because we expect the PR team from NOAA to be at the hearing pitching Cal Am's project.

This isn't easy reading but for those of you who have a stake in what happens to our marine environments, you may find it interesting.

Madeleine Clark, Director
Elkhorn Slough Coalition
(831) 663-3130

The staff report can be found online at www.waterboards.ca.gov/centralcoast/.
In the center of the homepage select "Click here for List of Public Notices & Draft Orders"..
At top of that page under "Public Notices-Moss Landing Desal Projects"..
Select 3rd listing: Update of Moss Landing Power Plant and Pilot Desal Plants

FROM:

Elkhorn Slough Coalition
8145 Messick Road
Prunedale, California 93907

Madeleine Clark, Director
(831) 663-3130

TO:

Chair Jeffrey S. Young and Members of the Board
Central Coast Regional Water Quality Control Board
895 Aerovista Place, Suite 101
San Luis Obispo, CA 93401

August 18, 2006

**RE: September 7, 2006 Public Hearing:
Poseidon Resources Corporation and California American Water Company
Pilot Desalination Projects in Moss Landing, Monterey County and
Expired LS Power (Plant) NPDES Permit No. 00-041**

Dear Chair Young and Board Members Shallcross, Jeffries, Press, Bowker,
Hayashi and Hunter:

On October 29, 2002, the Superior Court for the State of California in and for the
County of Monterey ordered that the Intended Decision for the above referenced
NPDES permit be deemed the Statement of Decision. The Court found that:

*"The Elkhorn Slough ecosystem is a threatened, biologically rich wetland system
of exceptional value which has been subjected to 50 years of entrainment by the Moss
Landing Plant and will be impacted for the life of the facility. With such long term,
significant environmental repercussions at stake, it is imperative that the analysis the
law requires be fully and meaningfully undertaken.*

*A writ of mandate shall issue compelling the Regional Board to conduct a
thorough and comprehensive analysis of Best Technology Available applicable to the
Moss Landing Power Plant."*

The Central Coast Regional Water Quality Control Board (Regional Water Board)
conducted a hearing on May 15, 2003 in an attempt to comply with the Court's directive.
Subsequent proceedings and arguments have addressed habitat enhancement
mitigation and the following specifics of the court's ruling.

*...Finding number 48 acknowledges that Duke must use Best Technology
Available to minimize this adverse environmental impact and in a concluding sentence
states, "In this case the cost alternatives to minimize entrainment impacts are wholly
disproportionate to the environmental benefits."*

Duke Energy produced cost estimates that it claimed made the cost of alternative cooling technologies "wholly disproportionate" to any environmental benefits to be achieved. The Regional Board apparently accepted this input without any independent study or analysis.

Finding number 48 is not supported by the weight of the evidence. As outlined above, there is no evidence in the record of a comprehensive, definitive consideration of cooling water alternatives by the Regional Board to apply Best Technology Available to the Moss Landing Power Plant. The evidence is at best meager, and at worst, speculative and based on historical conjecture.

Contrary to the court's findings, the Regional Water Board concluded from the May 15, 2003 Public Hearing regarding this issue that "Finding No. 48 *is* supported by the weight of the evidence." No new evidence or meaningful analysis was provided at the hearing to support this statement. Voices of the Wetlands (VOW) appealed.

VOW's pending litigation concerning the Regional Water Board's failure to comply with the court's directive including arguments regarding "wholly disproportionate" and "habitat enhancement" should be considered moot in light of the U.S. Court of Appeals for the Second Circuit decision against the federal Environmental Protection Agency (EPA). A three-judge panel for the federal appellate court said **"we find that the EPA exceeded its authority by allowing compliance with section 316(b) (of the U.S. Clean Water Act) through restoration methods."**

The February 3, 2004 decision **agreed with EPA rules mandating closed-cycle cooling as the national minimum technology for new power plants** and said dry cooling is a type of such technology that would be acceptable. The court indicated that **the minimum technology standard also would apply to existing plants.**

The following points are key findings of the Second Circuit decision:

--Allowing restoration as mitigation for power plant impact is "plainly inconsistent with the statute's text and Congress's intent beneficial to the environment, have nothing to do with the location, the design, the construction, or the capacity of cooling water intake structures, because they are unrelated to the structures themselves."

--"Restoration measures correct for the adverse environmental impacts of impingement and entrainment; they do not minimize those impacts in the first place. Similarly, restoration measures would allow a facility, at least in theory, to impinge and entrain unlimited numbers of organisms provided that other steps maintained acceptable water quality, here measured by wildlife levels as opposed to pollutant concentration.

--We think the EPA's own findings reveal that restoration measures are inconsistent with Congress's intent that the "design" of intake structures be regulated directly, based on the best technology available, and without resort in the first instance to water quality measurements.

--...we note that Congress rejected a proposed amendment to section 316(b) that would have explicitly allowed restoration measures.

—Accordingly, we find that the EPA exceeded its authority by allowing compliance with section 316(b) through restoration methods, and we remand that aspect of the Rule.

--...restoration measures, which we have already determined contradict the plain meaning of the Clean Water Act.

Members of the state legislature, both Democrats and Republicans (supported by the Governor) are enacting laws to make once-through cooling at coastal power plants illegal in California. The State Lands Commission and the California Ocean Protection Council have adopted policies to eliminate once-through cooling and encourage the use of closed-cycle cooling that will reduce impacts to marine environments by 95 percent. These policies apply to Moss Landing, the Elkhorn Slough and 21 other coastal power plants.

LS Power and Regional Water Board staff appear to be unaware that (environmental) state policy and law supersede federal requirements and mandates, if they are more stringent. Federal laws are minimum standards for compliance. In the case of Moss Landing, neither federal or state policy (or law) support LS Power and water board staff assertions that “utilities cannot realistically choose a compliance alternative without knowing the Court’s decision.” The Second Circuit Court made its intentions clear. “Pending litigation” is not a viable excuse for LS Power non-compliance.

It is the responsibility of the Regional Water Board to protect the marine resources of the public by insisting on state and federal environmental protection policy implementation and compliance.

Impacts to the Moss Landing Harbor, Elkhorn Slough and Sanctuary Ecosystems:

In addition to the laws prohibiting use of once-through cooling, it is important to examine monitoring results from studies funded to report the impact of thermal discharge from the Moss Landing power plant. Preliminary findings and observations from the completed monitoring project of the **Ecological Effects of the Moss Landing Thermal Discharge** (www.mbnmssimon.org/sections/sandyFloor/project) show that in spite of statements to the contrary, thermal discharge has direct adverse environmental impacts on the ecosystem.

PROJECT FINDINGS:

Summary to Date: This monitoring project was completed in February 2006. A draft final report was submitted in early March. We expect a final version of the report will be available sometime this year. What follows are exceptionally revealing preliminary findings and observations.

Monitoring Trend(s):

* Huge numbers of By-the-Wind-Sailor jellies *Veleva veleva* washed up on the beach during both April and May 2003. **In some places there were drifts 1 foot deep, with concentrations approaching 100 percent cover in the upper intertidal along the entire beach. *Veleva* continue to come ashore in significant numbers even in late July—an unusual occurrence.** While *Veleva* have always been present in the Bay, and generally are stranded during the late spring, **the numbers seen this year surpass any that the investigators remember.**

* Three species of amphipods have been found in the lowest intertidal zone: *Americhelidium* (formerly *Synchelidium*), *Grandifoxus grandis*, and *Mandibulophoxus gilesi*. This is encouraging, because although no quantitative samples have been taken from the beach since the 70s, periodic qualitative surveys have not found amphipods. **One amphipod that was previously found on the beach in significant numbers, *Eohaustorius washingtonianus*, has not yet been found.**

* In conjunction with the collection of subtidal samples, qualitative surveys were made by divers using underwater scooters. **During the June 2003 collection large numbers of juvenile cancer crabs (probably *Cancer gracilis*) were observed on the sandflats surrounding the canyon head. Densities were several dozen per square meter. Despite numerous dives in the area over many years, we had not previously observed this phenonem.**

When we went out again in July 2003, most of the small crabs were gone from the shallow sandflats, but large numbers were seen on the walls of the canyon out to about 50'. **Apparently, the sandflats near the canyon head are acting as a nursery area for cancer crabs.**

* **On all but one of the 19 cruises through May 2003, increased temperature, relative to surrounding bay water, was observed at the plume site. Surface sea-water temperature averaged 3.4 degrees C higher at the discharge site than at locations 500 m from the site (range 0.03 to 7 degrees C). Bacterial samples were streaked onto marine agar plates and incubated to evaluate colony development. Most experiments showed an increase in bacterial colony counts at the discharge site relative to the bay water 500 m away (Figure 1). On average, bacterial colony counts were two-fold higher at the discharge site than at the 500 m station.**

Record deaths in sea otter populations in 2003 and 2004 at Moss Landing (during times when the old part of the power plant that uses 95 percent of the intake waters was operating) are undoubtedly the results of heated discharge water from the power plant. Biologists have determined that toxic chemicals accumulating in shellfish (cancer crabs near discharge site) are the likely cause and these toxic chemicals can result in neurological damage in humans, too. Also, it is important to remember that sea otter populations increased sevenfold after five of seven generators were mothballed by PG&E in 1995. Sea otters are considered an indicator species of the overall health of the ecosystem.

Summary:

We, the people of California, have an excellent opportunity to reverse the overwhelming environmental damage done to marine environments by once-through cooling at coastal power plants. The first place to start is by denying "automatic administrative extensions" to power plants that utilize such antiquated and archaic technology.

Second, permits that allow desalination plants to rely on such intake and discharge water for desalted water production should be denied.

And finally, permits for desalination plants that rely on intake from and discharge to the near-shore waters of the Monterey Bay Marine Sanctuary, Moss Landing Harbor and Elkhorn Slough should also be prohibited.

To do otherwise is in clear violation of the intent of the Clean Water Act, the Second District Court of Appeals' findings and California state policy to eliminate once-through cooling, once and for all.

Sincerely,

Madeleine Clark, *Director*
Elkhorn Slough Coalition

Attachments:

Power Grab, *Monterey County Weekly*, January 19-25, 2006
Correspondence from ESC to LS Power Group, February 22, 2006
Proposal Threatens Desalination Plans, *Monterey County Herald*, February 15, 2006
Otters Dying in Record Numbers, *San Francisco Chronicle*, May 30, 2003
Otter Deaths Rising, *Monterey County Herald*, April 15, 2004
Pesticides Make Harbor a Toxic Soup, *Monterey County Herald*, April 23, 2005
CAL AM Faces Penalties on Trout, Frogs, *Monterey County Herald*, July 2, 2005
NOAA Plays PR Role for CAL AM, *Monterey County Herald*, August 6, 2006

Posted on Sun, Aug. 06, 2006
Monterey County Herald

NOAA PLAYS PR ROLE FOR CAL AM

By Madeleine Clark
Guest commentary

At taxpayers' expense, the National Oceanic and Atmospheric Administration has appointed itself public relations representatives for California American Water's desalination project in Moss Landing.

Failing to have collected past fines and enforce mitigation measures imposed upon Cal Am for over-pumping on the Carmel River, NOAA has now agreed to intervene in any rate hearings before the state Public Utilities Commission concerning Cal Am's ability to recoup from ratepayers the costs of a new water source or mitigation fees on the river. NOAA is to explain how those costs benefit steelhead and ratepayers. Cal Am, by paying about \$10 million in "mitigation fees," will then avoid potentially massive fines, \$330 million per year, for violations of the Endangered Species Act.

NOAA also agreed to help Cal Am by meeting with officials of the Monterey Bay National Marine Sanctuary, the California Coastal Commission, the State Water Resources Control Board, the U.S. Fish and Wildlife Service and the California Department of Fish and Game regarding Cal Am's applications for the Coastal Water Project, which includes the desalination plant and an aquifer storage and recovery project in the Seaside Basin.

NOAA continues its long practice of accepting buy-off money from big corporations to look the other way concerning project developments affecting the Elkhorn Slough and the Monterey Bay. NOAA previously received \$1.425 million in "monitoring" funds from Duke Energy to ignore Clean Water Act mandates requiring best technology available, i.e., the elimination of 50-year-old, once-through cooling at Duke's Moss Landing power plant.

NOAA's agreement with Cal Am isn't the best solution. There are several better ones:

- Water from the Salinas River and/or Nacimiento, San Antonio reservoirs.
- Recovery of the 10,000 acre-feet discharged into the ocean annually from the reclamation plant in Marina.
- Captured and treated runoff water.
- Some 10,000 acre-feet from Clark Water Co. in Greenfield.
- A refurbished dam on the Carmel River.
- A new rubber dam on the Salinas River to capture winter storm water.
- Metering ag wells, which results in an immediate decrease of ag water consumption by 30 percent.
- Aquifer storage and recovery from Seaside, Marina, Salinas and Castroville wells.

The list goes on and on. So why focus on desal in Moss Landing? Because it relieves Cal Am of \$330 million in annual fines and penalties imposed by NOAA.

As long as the company shows it is doing something high-profile, it supports its arguments for hefty rate increases for a project it will never build. Why should it when it can get water for free from the Carmel River?

Why aren't other alternatives moving along? Because Cal Am pays millions for a lot of hype about its coastal desalination project. The project is contingent on utilizing discharge water from the Duke power plant to dilute brine, but proposals in the California Legislature are moving forward to outlaw once-through cooling at all coastal power plants. Because of the impact to the marine environment from such archaic and antiquated cooling technology, lawmakers – including the governor and leaders in both parties – have determined that once-through cooling has got to go.

Like other coastal power plants using once-through cooling, the old part of the Moss Landing facility – which uses 90 percent of the 3,700 acre-feet of cooling intake water daily from the bay and the slough – will be decommissioned and/or demolished in the near future. This is inevitable.

What, then, does Cal Am propose to do with the brine? Discharge it into the sanctuary or the Elkhorn Slough? Unlikely. Maybe it plans to use the argument that if it is discharged through Duke's power plant outfall at the mouth of the harbor and the Elkhorn Slough, it won't hurt anything. Not so. The company fails to acknowledge that the Elkhorn Slough is a nursery for many species that inhabit the Monterey Bay Sanctuary. Water salinity and temperature at the mouth of the harbor are like road signs for migrating and spawning fish populations.

NOAA is backing Cal Am's proposal to compromise the Elkhorn Slough estuarine reserve in the same way the agency allowed Cal Am to destroy the Carmel River ecosystem: through neglect, incompetence and lack of integrity. What's important to NOAA scientists is a continual revenue stream to provide themselves with the latest technical toys and boat rides on the bay.

Protecting the public's interests and providing policymakers with viable non-biased information to make informed decisions is the least of their priorities.

Now that NOAA has become a PR consultant, let's disqualify its recommendations for what they are – bought and paid for by Cal Am.

Madeleine Clark is a lifelong resident of Monterey County and director of the Elkhorn Slough Coalition, which she founded in 2000 to file formal objections against Duke Energy's use of once-through cooling at its power plant in Moss Landing. She can be reached at madeleine@got.net.

August 22, 2006

Central Regional Water Quality Control Board, Central Coast Region
895 Aerovista Place, Suite 101
San Luis Obispo, California, 93401

RE: CCRWQCB September 7, 2006 Public Hearing on Poseidon Resources Corporation and California American Water Company Pilot Desalination Projects in Moss Landing, Monterey County and Expired LS Power (Plant) NPDES Permit No. 00-041

Dear Chair Young and Board Members Shallcross, Jeffries, Press, Bowker, Hayashi and Hunter:

The undersigned organizations submit the following comments on the Poseidon Resources Corporation and California American Water Company (CAL-AM) Pilot Desalination Projects at Moss Landing, and the expired LS Power plant NPDES permit No. 00-041.

We appreciate the opportunity to comment and request that these and all other comments regarding the permit applications in question be presented to each board member as physical copies.

1) The pilot desalination projects should not be granted NPDES permits at this time due to unresolved issues regarding multiple project alternatives.

The California Public Utilities Commission recently released a notice of determination to prepare an Environmental Impact Report (EIR) on the desalination facility proposed by CAL-AM. This EIR will likely analyze feasible, practicable and environmentally-preferable alternatives to open ocean intakes including beach well intakes. If beach well intakes are selected as the preferred alternative there will be no need for the pilot test projects, which would be built at considerable expense to area ratepayers. We therefore request that the NPDES permits for the pilot projects be withheld until a preferred alternative for the CAL-AM desalination plant is selected.

In addition, two separate pilot desalination projects are currently being proposed for the Moss Landing area, one by CAL-AM and the other by Poseidon Resources. To avoid the environmental impacts and financial expense that would be caused by this redundancy of efforts, we request that the NPDES permits for the pilot projects be withheld until a single project is selected.

2) Permits should not be granted until a careful study of the Impingement, Entrainment and Outfall Impacts from the Desalination Pilot Projects has been conducted.

The staff report on the CAL-AM proposal states that the pilot desalination plant would have no impingement or entrainment issues because the facility takes water directly from the OTC system. This finding is inconsistent with the recommendations of the State of California.

Conner Everts
Desal Response Group

Joe Geever
Surfrider Foundation

Attachments:

Comments submitted by the Planning and Conservation League on the Proponent's Environmental Assessment (PEA) prepared by California American Water (Cal Am) for the proposed Coastal Water Project, Proceeding A.04-09-019

San Diego Union-Tribune, 7/23/2006, *Power plans could change desalination*



EPI-Center, 1013 Monterey Street, Suite 207 San Luis Obispo, CA 93401
 Phone: 805-781-9932 • Fax: 805-781-9384

San Luis Obispo **COASTKEEPER**[®]

Peter von Langen, Environmental Scientist
 Central Coast Water Board
 895 Aerovista Place, Suite 101
 San Luis Obispo, CA 93401

August 22, 2006

VIA FACSIMILE: 805-788-3580

Subject: Public Comment / Waste Discharge Requirements Order No. 01-119 / Poseidon Resources Corporation and California American Water Company Pilot Desalination Projects.

Mr. Von Langen,

On September the Central Coast Regional Board will consider granting Low-Threat coverage to Poseidon Resources Corporation and to California American Water Company for discharges from proposed pilot desalination projects at Moss Landing, CA.

The San Luis Obispo **COASTKEEPER**[®], a program of Environment in the Public Interest, is organized for the purpose of enforcing water quality, watershed and coastal planning regulations on the California Central Coast. As such, the SLO Coastkeeper and our supporters have serious concerns that the 2 projects do not propose Best Available Technology (BAT) and therefore would not meet Low-Threat requirements. Therefore, I am writing in opposition to Staff recommendation for Low-Threat coverage for either of these projects.

Our major concerns include, but are not limited to, the following:

1. To the extent that both of these projects propose to co-locate with the outdated Moss Landing Power Plant, granting Low-Threat coverage would be inconsistent with SWRCB and State Lands policy statements that once through cooling, as used at MLPP, is not Best Available



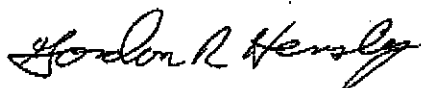
San Luis Obispo **COASTKEEPER**[®] a Program of Environment in the Public Interest is a trademark and service mark of **WATERKEEPER**[®] Alliance, Inc. and is licensed for use herein.

2. Technology. Approval of the proposed projects may have the unintended consequence of interfering with public interest in phasing out this method of power plant cooling.
3. Approval of Low-Threat status of the California American Water Company (CAL-AM) proposal is premature. The proposed CAL-AM project has yet to prepare an Environmental Impact Report as required as part of review currently underway by the California Public Utilities Commission. This EIR will include an examination of additional project alternatives, such as beach wells, that would make the pilot project before RWQCB3 moot. Alternatively, granting a Low-Threat discharge permit prior to completion of the EIR analysis will likely prejudice the EIR and ultimately interfere with the PUC process.
4. The likely impacts of these 2 pilot proposals cannot be approved in isolation from the multiple proposals around Monterey Bay. Approval of Low-Threat status for these 2 proposals avoids analysis of possible cumulative impacts to Elkhorn Slough, Monterey Bay, and near shore habitats.

In conclusion, the potential for adverse impact by approving the requested Low-Threat permit conditions requires that your Board disapprove these requests. The San Luis Obispo Coastkeeper Program urges denial of the Poseidon Resources Corporation and California American Water Company requests at this time.

Thank you for the opportunity to express some of our concerns with these two proposals.

Respectfully Submitted,



Gordon Hensley, San Luis Obispo COASTKEEPER®



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UNITED STATES DEPARTMENT OF COMMERCE
National Oceanic and Atmospheric Administration
NATIONAL OCEAN SERVICE

Monterey Bay National Marine Sanctuary
299 Foam Street
Monterey, California 93940

August 22, 2006

Roger W. Briggs, Executive Officer
Regional Water Quality Control Board
Central Coast Region
895 Aerovista Place, Suite 101
San Luis Obispo, CA 93401-5411

SUBJECT: Comments on the Enrollment of Poseidon Resources Corporation and the California American Water Company Pilot Desalination Projects in Moss Landing, CA under the General Permit for Discharges with Low Threat To Water Quality, NPDES No. CAG993001

Dear Mr. Briggs:

The Monterey Bay National Marine Sanctuary (MBNMS) was alerted via telephone on August 2, 2006 that the Central Coast Regional Water Quality Control Board (RWQCB) was planning on enrolling both the Poseidon Resources Corporation and the California American Water Company Pilot Desalination Projects under the General Permit for Discharges with Low Threat To Water Quality, NPDES No. CAG993001. The MBNMS subsequently reviewed the Notice of Public Hearing, which was received in our office on August 14, 2006. This Notice describes the two desalination pilot projects, and also includes a report on permitting issues regarding the Moss Landing Power Plant. This Notice requests comments on the proposed actions by August 22, 2006.

As stated in the RWQCB staff summary, the California American Water Company Pilot Desalination Plant in Moss Landing proposes to construct a pilot seawater desalination plant on property owned by LS Power in Moss Landing, and plans to operate the plant for up to one year. This pilot desalination plant will produce an average of 0.08 million gallons per day (MGD) of waste desalination brine and 0.06 MGD of product water. The discharger is proposing to combine the brine and product water with the large flow of LS Power's once-through cooling (OTC) water, which is regulated by Waste Discharge Requirements Order No. 00-041. The combined pilot desalination plant and OTC flows will be discharged into the Pacific Ocean and the Monterey Bay National Marine Sanctuary through LS Power's existing outfall diffuser system. Although the discharger will need to add approximately 129 pounds of chemicals per day to the discharge, the RWQCB has determined "The large flow of OTC water will render insignificant any potential adverse effects of the chemical additives on ocean water quality."

The staff summary also states: "There are no impingement and entrainment issues attributable to this pilot desalination plant because the facility takes its source water from the power plant OTC system".

As also stated in the RWQCB staff report, the Poseidon Resources Pilot Desalination Project proposes to construct a pilot seawater desalination plant on the former National Refractories facility in Moss Landing. This desalination plant proposes to discharge up to 0.29 million gallons per day

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(MGD) of waste desalination brine and product water into the Pacific Ocean and the MBNMS through the existing National Refractories outfall-diffuser system. This project will pump feed water from Moss Landing Harbor through an existing intake structure, and will pump waste brine to the Pacific Ocean and the MBNMS through an existing outfall with a diffuser. RWQCB staff have analyzed this project and concluded "Combining the brine and product water streams before discharge will render insignificant any potential adverse effects from increased salinity. Staff also evaluated the concentrations of constituents in the intake and discharge and found that there would not be any significant concentrations of pollutants at the outfall."

Admittedly, the fact that these two pilot projects are planned for enrollment under the General Permit came as a surprise given that the RWQCB office assured us in a letter (attached) dated August 6, 2002:

"...Regional Board staff will not allow any seawater desalination discharges to the MBNMS to be enrolled under the General Permit. This letter is being sent as our written assurance that all NPDES permits for any proposed seawater desalination discharges to the MBNMS will be drafted as individual permits, sent out for public comment, and then placed on a future agenda for Regional Board consideration."

It seems appropriate to remind RWQCB staff of both the above letter and the Memorandum of Agreement between the National Oceanic and Atmospheric Administration and the California Regional Water Quality Control Board which states in "Section E New and Revised Permits" that "Regional Boards will mail draft permits to NOAA and all other concerned agencies for comment 90 days before scheduled adoption of the draft permit by the Regional Board."

Although the opportunity to evaluate these projects under the preferred administrative process was lost, the MBNMS was able to adequately review and assess the RWQCB staff report well within the one-week turnaround that was requested. The MBNMS reviewed the inclusion of these two projects (under the NPDES No. CAG993001 General Permit for Discharges with Low Threat To Water Quality) under its authority defined at 15 CFR Sections 922.49 and 922.134(b), and procedures defined in Section V.E of the Memorandum of Agreement on water quality protection within the Sanctuary (June 1992).

The MBNMS has the following comments that need to be incorporated into these enrollments under the General Permit.

Monitoring

Enrollment of these two pilot desalination projects, under the General Permit for Discharges with Low Threat To Water Quality NPDES No. CAG993001, would require compliance with Monitoring and Reporting Program (MRP) No. 01-119. The MRP requires routine effluent and receiving water monitoring to verify compliance with the Order and protection of water quality. Although neither the MRP No. 01-119 nor the RWQCB staff summaries seem to identify the monitoring interval, we recommend that monitoring of these facilities occur on at least a quarterly basis. This is necessary to get an accurate depiction of seasonal variations.

Notifications

The regulations for the Monterey Bay National Marine Sanctuary at 15 CFR Part 922.132 prohibit discharges from within the boundaries of the MBNMS. Discharges occurring outside the MBNMS that subsequently enter and injure Sanctuary resources or qualities are similarly prohibited.

In order to protect the health of the MBNMS, we request that the permittee immediately notify our office at 888-902-2778 for any spills that are likely to enter ocean waters. In addition to facilitating potential enforcement investigations, the MBNMS seeks to track this information in order to evaluate existing and direct the implementation of new management measures. All correspondence shall be sent to the individual listed below:

Permit Coordinator
Monterey Bay National Marine Sanctuary
299 Foam Street
Monterey, CA 93940

The MBNMS anticipates that these Dischargers will work to prevent any potential future violations, and asks for the continued vigilance on the part of the RWQCB to assure that NPDES permits are in full compliance. We hope that these Dischargers recognize the need for, and value of, a healthy marine ecosystem. Proper management of these facilities is a necessary element of sound coastal stewardship, and is necessary to ensure that essential recreational uses, such as surfing, kayaking, boating, whale watching, fishing, research and beach walking are not compromised.

Lastly, and as stated in the RWQCB staff report, a full-scale facility would be regulated by an individual NPDES permit, and does not qualify for enrollment here. As a reminder, it should be noted that alteration of the seabed is also prohibited under MBNMS regulations, and would therefore require permission. MBNMS regulations envision that activities that violate Sanctuary prohibitions can be allowed provided we can make a determination that such activities will have only "negligible, short term adverse effects". Please remember to include this higher-level threshold when participating in, or coordinating any CEQA environmental reviews of future desalination projects.

Thank you for the opportunity to review these proposed enrollees under the General Permit for Discharges with Low Threat To Water Quality, NPDES No. CAG993001. Assuming that our comments are implemented into this Order, the MBNMS does not object to the issuance of this permit enrollment [15 CFR Section 922.49(e)]. Please send a copy of the signed permits to the Sanctuary office after the Regional Board adopts them at the September 7, 2006 public meeting.

If you have any questions regarding our comments please contact Ms. Deirdre Hall in the MBNMS office by phone at 831.647.4207 or via email at deirdre.hall@noaa.gov. Thank you for your cooperation with the Monterey Bay National Marine Sanctuary.

Sincerely,



Holly Price
Acting Superintendent

cc: D. Bizot, NMSP



California Regional Water Quality Control Board
Central Coast Region



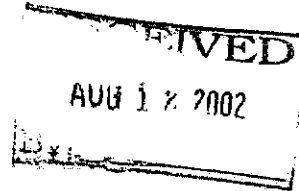
Winston H. Hickox
 Secretary for
 Environmental
 Protection

Internet Address: <http://www.swrcb.ca.gov/rwqcb3>
 81 Higuera Street, Suite 200, San Luis Obispo, California 93401-5411
 Phone (805) 549-3147 • FAX (805) 543-0397

Gray Davis
 Governor

August 6, 2002

Mr. William Douros
 Monterey Bay National Marine Sanctuary
 299 Foam Street
 Monterey, CA 93940



Dear Mr. Douros:

AGREEMENT TO NOT ENROLL DESALINATION DISCHARGES WITHIN THE MONTEREY BAY NATIONAL MARINE SANCTUARY UNDER THE REGIONAL BOARD'S NPDES GENERAL PERMIT FOR DISCHARGES WITH LOW THREAT TO WATER QUALITY (ORDER NO. 01-119)

In December 2001, the Central Coast Regional Water Quality Control Board (Regional Board) considered adoption of the National Pollutant Discharge Elimination System (NPDES) General Permit for Discharges with Low Threat to Water Quality (General Permit). The Regional Board considered the Monterey Bay National Marine Sanctuary (MBNMS)'s written comments and verbal testimony supporting removal of aquaculture facilities and seawater desalination discharges from the list of discharges that could potentially be enrolled under the General Permit. At that meeting, the Regional Board adopted Order No. 01-119, which included seawater desalination discharges within the General Permit. The MBNMS subsequently appealed the decision to the State Water Resources Control Board. In a March 2002 meeting, you requested that the Regional Board reopen the General Permit and prohibit enrollment of desalination facilities within the MBNMS. As a compromise to limit the impacts on staff resources (the Regional Board is currently facing a budget reduction), Assistant Executive Officer Brad Hagemann agreed not to allow any seawater desalination discharges within the MBNMS boundaries to be enrolled under the General Permit.

On July 22, 2002, Mr. Matt Thompson of our staff met with Ms. Holly Price and Ms. Deirdre Hall of your staff to assist in the development of guidelines to minimize adverse environmental impacts from seawater desalination. From that meeting, we understand the MBNMS continues to have concerns that brine discharges from seawater desalination facilities remain listed as eligible for coverage under the General Permit. Although it remains listed in the General Permit, please be assured that Regional Board staff will not allow any seawater desalination discharges to the MBNMS to be enrolled under the General Permit. This letter is being sent as our written assurance that all NPDES permits for any proposed seawater desalination discharges to the MBNMS will be drafted as individual permits, sent out for public comment, and then placed on a future agenda for Regional Board consideration. We sincerely hope this letter adequately addresses and satisfies the MBNMS's concerns.

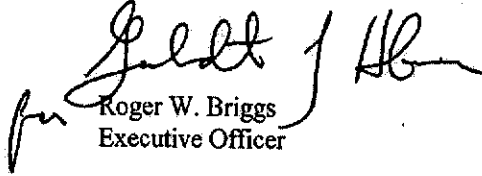
California Environmental Protection Agency



August 6, 2002

If you'd like to discuss this matter further, please feel free to contact Gerhard Hubner at (805) 542-4647 or Brad Hagemann at (805) 549-3697.

Sincerely,


Roger W. Briggs
Executive Officer

cc:

Jean Choi
The Ocean Conservancy
116 New Montgomery Street, Suite 810
San Francisco, CA 94105

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File: Monterey Bay National Marine Sanctuary & NPDES General Permit for Discharges with Low Threat to Water Quality

California Environmental Protection Agency



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