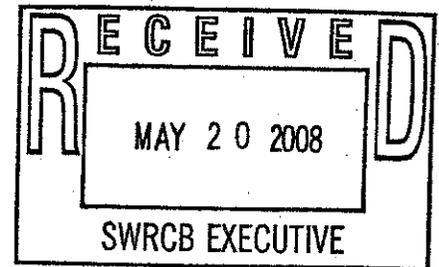


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Via Facsimile and E-Mail

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**Comments on Scoping Document for
 Once-Through Cooling Policy**

Dear State Water Board Staff and Members:

Thank you for the opportunity to comment on the March 2008 "Scoping Document: Water Quality Control Policy on the Use of Coastal and Estuarine Waters for Power Plant Cooling." Since 2001, we have been involved on behalf of various conservation organizations in both administrative and litigation matters related to once-through cooling systems at several coastal power plants, including those located in Moss Landing, Morro Bay, El Segundo, Huntington Beach, Carlsbad-Encina, Contra Costa, and Pittsburg. We applaud Staff's extensive work on this important public policy matter and appreciate the opportunity to share our experience with the Board. As explained below, we believe that California can and should take a leadership role in phasing-out the use of environmentally destructive once-through cooling technology along our coastline as expeditiously as possible.

As Staff is aware, federal implementation of section 316(b) of the Clean Water Act, 33 U.S.C. § 1326(b), has been slow and tortuous. After the U.S. EPA's initial section 316(b) implementing regulations were struck down for procedural infirmities in the mid-1970's, the agency took approximately two and a half decades to promulgate replacement regulations. In response to litigation, EPA finally adopted new regulations in the early 2000's, only to have large portions of them struck down as illegal in Riverkeeper v. EPA, 358 F.3d 174 (2d Cir. 2004) ("Riverkeeper I"), and Riverkeeper v. EPA, 475 F.3d 83 (2d Cir. 2007) ("Riverkeeper II"). With a small part of the Riverkeeper II now pending before the U.S. Supreme Court, where a decision is not likely until late next spring, and with a new federal administration coming into office in early 2009, we can reasonably expect additional lengthy delays in EPA regulatory guidance to the states.

In the meantime, the NPDES permits for many coastal power plants in California are now on long administrative extensions -- and several more are facing imminent

expiration dates in the coming year – while the Regional Water Boards struggle with the issue of how to exercise “best professional judgment” to comply with section 316(b) in the absence of federal guidance. Because these coastal power plants withdraw billions of gallons of public trust seawater each day, and kill an enormous number of marine organisms in the process, California should not delay in enacting statewide guidance that will protect our increasingly vulnerable marine environment. Recent resolutions by both the State Lands Commission and the Ocean Protection Council call for a phase-out of once-through cooling systems along California’s coast and strongly support affirmative action by the State Board to address this important environmental issue.

Under the cooperative federalism approach built into section 510 of the Clean Water Act, 33 U.S.C. § 1370, it is undisputed that California has the ability to set its own more stringent water quality standards to protect its coastal resources. See 60 Fed. Reg. 41,582 (July 9, 2004) (acknowledging in the section 316(b) regulations that section 510 of the Clean Water Act “reserve[s] for the States authority to implement requirements that are more stringent than the Federal requirements under state law”). Additionally, California’s Porter-Cologne Act mandates that the Board minimize the impacts of coastal power plants using seawater on the intake and mortality of all forms of marine life. Cal. Water Code § 13142.5(b). Thus, the State Board not only has the authority to adopt its own, more protective regulations to implement section 316(b) of the Clean Water Act, it has an affirmative duty under section 13142.5(b) of the Porter-Cologne Act to ensure that state water quality regulations and resulting permits minimize impacts to all living coastal resources. As discussed below, the Board should use its expansive legal authority to close some of the most egregious loopholes embedded in EPA’s recent regulations. Given the dire state of our ocean and coastal resources, there is no logical reason or public policy justification for California to await further action by either EPA or the Supreme Court.

A. New vs. Existing Facilities

In the Scoping Document, Staff recommends adhering to EPA’s definitions in distinguishing “new” from “existing” facilities. As you know, section 316(b) itself does not distinguish between new and existing facilities, and the artificial distinction that EPA has created in its implementing regulations is inconsistent with the definition of a “new” facility under other provisions of the Clean Water Act. For the NPDES program more generally, the term “new source” is defined as:

- (i) The building, structure, facility or installation is constructed at a site at which no other source is located; or
- (ii) The building, structure, facility or installation totally replaces the process or production equipment that causes the discharge of pollutants at an existing source; or
- (iii) The production or wastewater generating processes of the building, structure,

facility or installation are substantially independent of an existing source at the same site. In determining whether these are substantially independent, factors such as the extent to which the new facility is integrated with the existing plant, and the extent to which the new facility is engaged in the same general type of activity as the existing source should be considered.

40 C.F.R. § 403.3(k). Thus, a power plant that is decommissioned and rebuilt or "repowered" (as proposed for the Morro Bay or Carlsbad plants, for instance) is clearly a "new source" for purposes of Clean Water Act section 402 permitting. Similarly, new generating units added to an existing facility that operate independently from existing units – as is normally the case – also would likely be "new sources" under section 402. Yet, EPA's implementing regulations classify both of these new sources as "existing" for purposes of section 316(b) compliance, as long as the new generating units are connected via a pipe to the old intake pipe and the total intake capacity does not increase. 40 C.F.R. § 125.83.

This gaping loophole in EPA's section 316(b) regulations, which ensures that virtually no repowering project along the California coast will have to satisfy the "new" facility standards, makes no sense from a public policy and environmental protection perspective. As EPA has explained, "[t]he Clean Water Act imposes more stringent requirements on new sources based on the concept that new facilities have the opportunity to install the best and most efficient production processes and wastewater treatment technologies." Letter Robert G. Wills, EPA Region 9, to Vincent J. Varsh, City of Los Angeles (see http://www.epa.gov/region09/water/pretreatment/files/ambitech_1993-05-11_new_source.pdf). When it promulgated the definition of "new source," EPA properly concluded:

The legislative history of the CWA indicates that new source requirements were intended to apply where new construction allows flexibility to incorporate new pollution control technology. The fact that a facility can be constructed to utilize an existing waste treatment plan does not address the issue of whether new technology could have been installed. To allow the use of an existing treatment system, by itself, to preclude the application of new source requirements would frustrate clear statutory intent.

49 Fed. Reg. 37,998, 38,043-44 (Sept. 26, 1984). The same rationale applies with equal force to the technology-forcing requirement of section 316(b). Repowered facilities with brand new generating units stand in precisely the same position as any other "greenfield" project, except that they have the advantage of land and existing infrastructure, and should be held to the same best technology standards.

Allowing an applicant to avoid the most stringent section 316(b) best cooling

system technology standards simply because the facility proposes to connect the new generating unit(s) to an old intake structure turns the Clean Water Act on its head. Such facilities, which have been destroying our marine resources for decades, will in effect be "grandfathered" to continue this destructive behavior for many decades to come, even though alternative technologies are available and in use today. Moreover, it is clear under state law that both new and existing facilities must satisfy the best design and technology standards. Cal. Water Code § 13142.5(b). Thus, we urge the State Board to adopt a more accurate definition of "new" facilities under section 316(b) and section 13142.5(b), akin to the Clean Water Act's "new source" definition, which will ensure that brand new, more efficient and more profitable operating units meet the highest standards of protection.

B. Determination of Baseline and Feasibility

The proposed Track I/Track II standards are consistent with technology-driving language of Clean Water Act section 316(b) and Porter-Cologne Act section 13142.5(b) and with the Second Circuit Court of Appeals' conclusion that best technology available must be based not on an average facility, but on the "optimally best performing" facility. Riverkeeper II, 475 F.3d at 100. We urge the Board to take special care, however, in articulating a test for "feasibility" and in defining the baseline against which compliance will be measured. Failure to do so could create large exceptions that would swallow the rule – and entirely negate the intent of the statewide guidance.

Feasibility: The Scoping Document indicates that a facility would be allowed to follow Track II instead of Track I if it is not "feasible" to comply with Track I by the assigned compliance date, taking into account the availability of space, potential impacts from increased noise and neighboring uses, air traffic safety, public safety, and the ability to obtain necessary permits. While these considerations seem reasonable on their face, the Board should be aware of how the industry has used similar subjective factors in the past to avoid closed-cycle cooling. For instance, the Regional Board allowed the new, state-of-the-art generating units for the Moss Landing plant to use once-through cooling rather than a closed-cycle alternative, based solely on the facility owner's undocumented assertions that it could not obtain air permits for an alternative cooling system and that cooling towers were, in its view, aesthetically unacceptable. In Morro Bay, Regional Board staff supported the facility's successful arguments before the Energy Commission, over the objections of Energy Commission staff, that the proposed brand new power plant could not employ alternative cooling due to lack of space; that argument was based on sizing the cooling system for an ambient air temperature of 85 degrees, a condition that hardly ever occurs on this cool part of the central coast, and was virtually unquestioned by either Regional Board staff or the Energy Commission. Thus, industry has been highly successful at manipulating subjective "feasibility" factors to avoid the use of alternative cooling systems even for brand new generating facilities, with little or no serious scrutiny by the regulatory agencies.

Accordingly, we strongly urge the State Board to build objectivity and accountability into any "feasibility" exceptions contained in the final rule. Self-serving claims of infeasibility should not be sufficient to avoid compliance with Track I. The final guidance should make it clear that compliance with Track I is the anticipated standard in all but the rarest of circumstances. If a facility nevertheless invoke a "feasibility" exception, the rules should require independent review by a balanced outside expert team and an express finding of infeasibility by the Regional Board based on a preponderance of evidence in the record.

Baseline for Comparability: In those rare circumstances where Track II compliance is adequately documented and found to be appropriate, the final guidance or rule should further clarify the baseline against which such compliance will be monitored. The Scoping Document explains that Track II compliance requires reduction in the level of adverse environmental impacts to a comparable level to that which would be achieved under Track I, but it does not explain how this "comparable level" must be attained or will be measured. Again, our concern is that the power plant industry has repeatedly demonstrated its ability to manipulate subjective standards to avoid compliance. For instance, if comparability is measured by flow intake (as a proxy for entrainment damage), our experience at several different coastal plants, owned by several different corporations, suggests that industry will "game" the flow rates to their best advantage, either using unrepresentative historic numbers or manipulating their intake systems and flow rates in advance of the compliance date to achieve desired comparability levels.

To avoid such results, new guidance or rules should explicitly provide that comparability is an objective factor based on the design flow rates. Thus, for example, if two new units designed to generate 1,200-MW would utilize 600,000 gallons per day of cooling water through a once-through system and would reduce that usage by 95 percent through a wet recirculation system, then the objective comparability standard under Track II would be no more than 30,000 gallons per day. If on the other hand, older, inefficient units are operating at reduced capacity and withdrawing only 50,000 gallons per day through their once-through cooling system, then a wet recirculation system would reduce their intake to 2,500 gallons per day. Only by pegging the comparability baseline to power generation flow rates will California's new policy achieve the technology-forcing marine life mortality reductions required by state and federal law.

Tying comparability to instantaneous power generation flow rates can also address the temporal concerns raised by many of the peaker plants, especially in Southern California, that do not operate much of the year and then run at high rates during warm months when larval species are maximally impacted. We encountered this situation in our efforts around the El Segundo facility, where annualized flow rates do not serve as an adequate proxy for marine mortality during by high flow summer months. The new guidance should make it clear that comparability reductions of 95 percent (or whatever the

relevant number) cannot be annualized, but instead, apply continuously to all flow rates. Without a clear articulation of this standard, flow rates at existing plants that continue to serve as peakers or operate intermittently will not necessarily reflect marine mortality.

C. Interim Restoration

Staff's conclusion that restoration is not allowed to achieve compliance with section 316(b), but may be used as additional protection under state law is legally accurate. Moreover, the use of interim restoration requirements will force coastal power plants to internalize the cost of their environmental externalities and will "level the playing" field for energy facilities that do utilize and destroy state public trust resources. Indeed, the continued public subsidy of coastal power plants using once-through cooling – through the provision of free ocean water and the public trust resources it contains – hampers the market development of alternative energy resources necessary to meet the State's commitment to greenhouse gas reductions under AB 32. At this point in history, there is no public policy justification for the continuation of these public subsidies; the industry should be required immediately to begin paying the full cost of its destructive practices through restoration. By putting such a system in place, the State Board will also create appropriate market signals and incentives for the industry to move expeditiously to alternative cooling systems.

D. The Supreme Court Case and Cost-Benefit Considerations

As the Scoping Document properly recognizes, the Second Circuit Court of Appeals resoundingly rejected the use of cost-benefit analysis to determine compliance with section 316(b). This part of the Riverkeeper II decision is now pending before the Supreme Court and is unlikely to be resolved before next spring. However, there is no need for California await that decision. Even if the Supreme Court were to reverse the Second Circuit on this point and allow EPA's use of cost-benefit analysis in determining best technology available, California can and should set higher standards. The site-specific cost-benefit exception built into EPA's suspended section 316(b) regulations creates an enormous loophole that will allow most power plants to escape significant regulation. California law does not provide for a cost-benefit analysis, either in section 13142.5(b) of the Porter-Cologne Act or in the various provisions of the California Coastal Act and the California Ocean Protection Act, all of which stress the importance of our coastal resources to both the ecological and economic health of the state. California can and should move ahead under state law with new guidance that does not allow the kind of cost-benefit exception that the Second Circuit rejected.

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We appreciate your consideration of our comments and look forward to the State Board's next steps on this very important environmental policy matter.

Sincerely yours,

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