

August 1, 2011

Via Electronic Mail (in PDF)

Ms. Jill Tracy Senior Environmental Counsel San Diego Gas & Electric 101 Ash Street, HQ13 San Diego, CA 92101

Re: Draft EIR for the San Diego Shipyard Sediment Site Proposed Remediation

Dear Ms. Tracy:

At the request of San Diego Gas & Electric (SDG&E), ENVIRON International Corporation (ENVIRON) has prepared this letter to highlight potential critical issues associated with draft documents supporting the Environmental Impact Report (EIR) for the proposed San Diego Shipyard Sediment Site (Site) remediation. Although four documents were reviewed<sup>1</sup>, the primary focus of ENVIRON's comments concerns the March 31, 2011 *Draft Water Quality Technical Report, Shipyards Sediment Site, San Diego Bay, San Diego, CA* by Geosyntec Consultants (Geosyntec, 2011).

ENVIRON notes the following critical issues:

1. The proposed water column turbidity monitoring plan is insufficient to characterize the potential migration of contaminated sediment to areas adjacent to the Site remedial footprint. On page 19 of Geosyntec (2011), it is noted that turbidity samples will be collected from the water column at locations 250 and 500 feet from active dredging operations. This monitoring will be conducted to evaluate the effects on water quality due to contaminated sediment suspended during dredging. However, this data will be insufficient for characterizing the deposition of contaminated footprint sediment to areas directly adjacent to the footprint.

For example, at the northwestern end of the footprint, the nearest turbidity monitoring station is located 100 feet beyond the boundary of the non-footprint polygon SW29. There will be no data available to evaluate potential contamination with suspended footprint sediments that deposit to SW29. Although the CRWQCB found in the September 15, 2010 version of the DTR that SW29 did not exhibit Beneficial Use Impairment and did not warrant remedial action, SW29 may be investigated in future CRWQCB action, as noted by David Barker (Chief of the Water Resource Protection Branch of San Diego Regional Water Quality Control Board) during his March 3, 2011 deposition (Barker, 2011 – statements starting at 11:49 AM <sup>2</sup>). Additionally, data will

<sup>&</sup>lt;sup>1</sup> 1) Draft Water Quality Technical Report, Shipyards Sediment Site, San Diego Bay, San Diego, CA; 2) Draft Marine Biological Resources Assessment Technical Report, Shipyard Sediment Site, National Steel and Shipbuilding Company (NASSCO), BAE Systems San Diego Ship Repair, Inc.; 3) Draft Hazards and Hazardous Materials Technical Report, Shipyards Sediment Site, San Diego Bay, San Diego, CA; and 4) Draft Traffic Impact Analysis, Shipyard Sediment Project.

<sup>&</sup>lt;sup>2</sup> Barker, D. 2011. Deposition of David Barker, March 3, 2011, San Diego, California.

be unavailable for the area 100 feet to the northwest of SW29, which may be included in a potential SW29 investigation.

As the area to the northwest of the footprint may incur future sediment investigations by CRWQCB, ENVIRON recommends that the potential contamination of surface sediments in these areas by the proposed Site dredging activities be better characterized by relocating the turbidity monitoring locations proposed by Geosyntec (2011) to stations closer to the immediate vicinity of the footprint boundary. Further safeguards may include the use of additional turbidity monitoring locations. Either option should include placement of a monitoring station not more than 50 feet from the northwest boundary of the footprint (approximately in the middle of polygon SW29). Additionally, ENVIRON recommends a pre- and post-dredging survey of concentrations of chemicals in surface sediment in SW29 and potentially-relevant areas to the northwest of SW29. Although the currently-proposed turbidity monitoring is a useful line of evidence, it is flawed as proposed and a comparison of pre- and post-dredging concentrations of COCs in surface sediment would serve as a much stronger line of evidence for evaluating the deposition of suspended footprint sediments to this area.

2. **Stated post-remedy sediment action levels are incorrect.** On page 20, Geosyntec (2011) notes:

"Sediment concentrations in a horizon that represents the first undisturbed depth beneath the dredge depth will be measured. COCs that will be monitored and compared to background sediment chemistry levels include copper, mercury, HPAHs, TBT, and PCBs. The background sediment chemistry levels are presented in Table 1."

This passage is incorrect. Concentrations of the COCs in surface sediment sampled immediately following dredging are to be compared to values corresponding to 120% of the concentrations in background sediment, as discussed on page 34-3 of the CRWQCB's September 15, 2010 version of the DTR. This passage and Table 1 of Geosyntec (2011) should be revised to reflect the approach detailed on page 34-3 of the DTR.

3. Recent investigations by BAE Systems do not appear to have been considered. Recent Site investigations conducted by BAE Systems (BAE) in support of their late 2010/early 2011 dry dock dredging project do not appear to have been incorporated into the draft EIR materials. During this time period, BAE conducted an investigation of surface and subsurface sediment chemistry in and adjacent to the proposed footprint area. This data is useful for multiple technical aspects of the EIR, including evaluating the likelihood that the dredged materials would be classified as hazardous waste and predicting potential impacts to water quality as a result of chemical releases from sediment. Waste characterization is a key factor in remedial cost allocation, and it is necessary to obtain a clear accounting of this remedial cost element (as well as the remainder of the remedial cost assumptions). Additionally, updated bathymetry in the BAE portion of the Site would likely improve engineering plans for the various remedial approaches. Turbidity and water quality data collected during BAE's dry dock dredging events should also be incorporated in the monitoring and mitigation plans, as they may offer a better understanding of the Site-specific performance of silt curtains and other efforts related to controlling the migration of suspended sediments.

4. Additional engineering and feasibility detail is needed regarding the proposed remedial activity. There is a paucity of supporting information regarding technical engineering information used to derive the proposed remediation plan. For example, on page 12 of Geosyntec (2011), Geosyntec states that "Under pier capping operations will likely be performed after sediment removal operations are fully completed". Due to the creation of slopes adjacent to the piers (due to dredging), under-pier sediment may slough off into the adjacent dredged areas, causing a potential persistent recontamination of these areas. This likelihood should be evaluated via modeling or other engineering information, and results should be incorporated into the overall project planning and made available for review. Additionally, supporting material is needed to fully understand why hydraulic dredging of under-pier sediment was excluded as a remedial option (currently, only capping of under-pier sediment is proposed). It is possible that hydraulic dredging may address under-pier contamination issues and protect against sloughing of under-pier sediment to adjacent areas. However, these options can only be fully explored by a thorough engineering feasibility evaluation.

Please let us know if you have any concerns or questions regarding the above comments. We look forward to reviewing future drafts of the EIR materials and continuing to provide technical assistance as needed.

Sincerely,

Jason M. Conder, PhD

Manager