

State of California
Regional Water Quality Control Board
San Diego Region

EXECUTIVE OFFICER SUMMARY REPORT
(April 13, 2011)

ITEM: 8

SUBJECT: Adoption of Cleanup and Abatement Order Addendum: Former Teledyne Ryan Facility (Tentative Addendum No. 4 to Cleanup and Abatement Order No. R9-2004-0258) *(Tom Alo)*

PURPOSE: To adopt Tentative Addendum No. 4 to Cleanup and Abatement Order No. R9-2004-0258.

PUBLIC NOTICE: The San Diego Water Board held a public workshop on January 10, 2011 to present an overview of Tentative Addendum No. 4 and to provide an opportunity for the public to provide comments. The public workshop and written comment period notice (Supporting Document 1) was posted on the San Diego Water Board's website and e-mailed to stakeholders subscribed on the State Water Board's ListServ Management System for the former Teledyne Ryan (TDY) facility. Tentative Addendum No. 4 including the supporting documents was also posted on the San Diego Water Board's website.

DISCUSSION: The former TDY facility consists of a 44-acre parcel located just south of Lindbergh Field in San Diego (Supporting Document 2). Waste releases from past aerospace manufacturing operations at the former facility have impacted the soil and groundwater. Contaminated sediments have also been discharged from the former facility to Convair Lagoon and San Diego Bay via the storm water conveyance system (SWCS) beneath the former facility. Some contaminated sediments remain in the SWCS, where they can be transported to the lagoon and bay.

Environmental investigation and cleanup activities are being conducted by TDY under Cleanup and Abatement Order (CAO) No. R9-2004-0258. Tentative Addendum No. 4 to the CAO (Supporting Document 3) requires TDY to cleanup wastes discharged to land at the former facility, cleanup contaminated sediments in the SWCS, and abate sediment discharges from the SWCS to the lagoon and bay. A subsequent Order must be issued to TDY and other responsible parties, if any, for the investigation and cleanup of contaminated sediments discharged

from this and other facilities to Convair Lagoon and San Diego Bay.

The former TDY facility is vacant and leased by the San Diego County Regional Airport Authority (Airport Authority). The Airport Authority plans on redeveloping the former facility following cleanup. Demolition activities are underway and being performed by the property owner, the San Diego Unified Port District (Port District). The Port District has demolished all above grade structures comprised of buildings, warehouses, and sheds (with the exception of Building 100). Removal of Building 100 and subsurface structures such as concrete slabs, foundations, utilities, and most of the SWCS is scheduled to commence in August 2011 and end approximately in August 2012. The demolition project will remove the majority of the polychlorinated biphenyl (PCB) sources from the former facility, which are found in the paint, joint compound, and concrete of the building materials.

All storm water runoff from the former facility is collected, treated, and discharged to the sanitary sewer system. When the property is redeveloped, a new SWCS is likely to be constructed.

Tentative Addendum No. 4 (Addendum) establishes soil and groundwater cleanup levels for the constituents at the former facility that could pose a significant risk to human health for industrial/commercial workers potentially exposed during or after redevelopment of the former facility. The constituents of concern (COCs) for human health include PCBs, volatile organic compounds (VOCs), dibenz(a,h)anthracene, total petroleum hydrocarbons (TPH), and total and hexavalent chromium. Cleanup levels for the COCs were set at risk-based concentrations developed in a human health risk assessment.

The risk based concentrations for total chromium in soil and groundwater are higher than the criteria used to classify wastes as hazardous for disposal purposes. The Airport Authority and Port District commented that if residual soil and groundwater concentrations exceed hazardous waste criteria, they would incur additional costs associated with managing and disposing of those wastes in a hazardous waste landfill if excavated or extracted during future redevelopment of the site. They requested the soil and groundwater cleanup levels be set at concentrations lower than hazardous waste criteria.

This concern is economic rather than environmental. The San Diego Water Board lacks an environmental foundation to require that soil and groundwater be cleaned up to below hazardous waste criteria. TDY, however, agreed to clean up soil to below hazardous waste criteria. Thus, in the Addendum, the soil cleanup level for total chromium was established at a level less than the hazardous waste criteria. TDY did not agree to cleanup groundwater to below hazardous waste criteria, so the groundwater cleanup level for total chromium was set at the risk based concentration. There should be no additional economic cost associated with disposal of groundwater with COC concentrations above hazardous waste criteria. This is because all liquid waste must be disposed of in a hazardous waste landfill regardless of the residual concentrations of COCs.

The groundwater in the area of the former facility has no designated beneficial uses so water quality objectives for drinking water and other uses do not apply. Following demolition and cleanup of the former facility, no wildlife will be exposed to residual constituents in soil and groundwater at the former facility because the surface will be graded and covered with asphalt, or another appropriate surface treatment. Thus, an ecological risk assessment for the former facility was not conducted. The surface treatment will also prevent storm water runoff from coming into contact with any residual pollutants in soil.

The SWCS that will not be removed during demolition, and will remain in operation consist of several main storm drains. The Addendum requires TDY to cleanup contaminated sediments in the 60-inch main storm drain that transects the former facility. TDY must investigate, and if needed, cleanup the 54-inch storm drain, and the off-site, "downstream" segments of the 30-inch west, 30-inch east, 18-inch, and 30-inch storm drains that extend from the southern property boundary to the lagoon and bay. These storm drains received discharges from the former facility until recently when they were capped with concrete at the southern property boundary. The 60-inch and 54-inch storm drains are the only active storm drains beneath the former facility, but they only receive storm water runoff from areas "upstream" of the former facility. TDY must also monitor groundwater seeps within the 60-inch and 54-inch storm drains, and must ensure that the quality of the seeps support the beneficial uses of San Diego Bay.

Cleanup of the former facility and the SWCS must be completed before initiating cleanup of contaminated sediment in Convair

Lagoon and San Diego Bay. This step will prevent recontamination of marine sediments in the lagoon and bay.

The findings and directives in the Addendum are supported by several technical reports submitted by TDY (Supporting Documents 7 through 18). These documents are cited in the Addendum to provide a technical foundation for the Addendum.

Based on the comments received, the Addendum No. 4 was substantially revised from the December 2010 version released for public review. The important revisions are discussed in the Key Issues section below. The comment letters are provided in Supporting Document 5. The Responses to Comments are provided in Supporting Document 6.

KEY ISSUES:

- (1) Many of the COCs and their cleanup levels were removed from the Addendum. These COCs were dropped because, at their highest detected concentrations in either soil or groundwater at the former facility, they did not pose significant risk to human health. Arsenic was dropped as a COC because the maximum soil detection at the former facility was lower than the background concentration.

References:

- Supporting Document 3 -Tentative Addendum No. 4
 1. Finding 7 – Constituents and Areas of Concern for Wastes in Soil and Groundwater (Page 4).
 2. Finding 13 – Technological and Economic Feasibility to Cleanup to Background Conditions (Page 5).
 3. Finding 14 – Alternative Cleanup Levels (Page 7).
 4. Directive 1.a – Corrective Action - Soil and Groundwater (Page 13).
- Supporting Document No. 6 - Response to Comments
 1. Comment No. 7a - Port District & Airport Authority (Page 31).

- (2) Soil and groundwater cleanup levels are set at risk based concentrations that will not pose a significant risk to future on-site workers. The San Diego Water Board lacks an environmental foundation to require that soil and groundwater be cleaned up to below hazardous waste criteria as requested by the Port District and Airport Authority. TDY, however, has agreed to clean up soil to below hazardous waste criteria and the Addendum reflects this agreement with respect to total chromium.

References:

- Supporting Document 3 -Tentative Addendum No. 4
 1. Finding 14 - Alternative Cleanup Levels (Page 7).
 2. Directive 1.a - Soil and Groundwater (Page 13).

- Supporting Document 6 - Response to Comments
 1. Comment No. 7c - Port District & Airport Authority (Page 32).

- (3) Residual VOC concentrations in groundwater seeps discovered within the 60-inch storm drain are below CTR criteria for San Diego Bay. As such, the groundwater seepage discharge to the 60-inch storm drain is an allowable non-storm water discharge under section B.2 of the San Diego County's MS4 storm water permit, and thus would be in conformance with Prohibition No. 8 of the Basin Plan.

References:

- Supporting Document 3 - Tentative Addendum No. 4
 1. Finding 10.c - Groundwater Seepage into the SWCS (Page 2).
 2. Directive 2.c - 54-inch and 60-inch Storm Drain Seep Monitoring (Page 15).
- Supporting Document No. 6 - Response to Comments
 1. Comment No. 10 - TDY Industries, Inc. (Page 6).
 2. Comment No. 1 - Environmental Health Coalition (Page 17).
 3. Comment No. 7 - Environmental Health Coalition (Page 20).
 4. Comment No. 3a - Port District & Airport Authority (Page 24).
 5. Comment No. 3b - Port District & Airport Authority (Page 25).
 6. Comment No. 3c - Port District & Airport Authority (Page 26).
 7. Comment No. 3d - Port District & Airport Authority (Page 27).
 8. Comment No. 10b - City of San Diego (Page 41)
 9. Comment No. 12 - City of San Diego (Page 47).
 10. Comment No. 17b - City of San Diego (Page 50).
 11. Comment No. 20 - City of San Diego (Page 52).
 12. Comment No. 38 - City of San Diego (Page 78).

- (4) Adoption of Tentative Addendum No. 4 is a project under the California Environmental Quality Act. A negative declaration was prepared for the project, and must be adopted prior to adopting the Addendum.

Reference:

- Agenda Item No. 7, Adoption of Negative Declaration: Former Teledyne Ryan Facility, Tentative Addendum No. 4 to Cleanup and Abatement Order No. R9-2004-0258 (Tentative Resolution No. R9-2011-0018).

LEGAL CONCERNS: None.

SUPPORTING DOCUMENTS:

1. Workshop and Public Comment Period Notice.
2. Site Location Map.
3. Tentative Addendum No. 4 to CAO No. R9-2004-0258
 - A. Clean Version of Tentative Addendum No. 4.
 - B. Underline/Strikeout Version of Tentative Addendum No. 4.

4. Emails from Bill Bosan (DTSC) dated February 11, 2011, and March 28, 2011 supporting the human health risk assessment.
5. Comment Letters.
6. Responses to Comments.
7. Site Characterization Report.*
8. PCB Characterization Report.*
9. Site Wide Risk Assessment.*
10. Remedial Investigation/Feasibility Study.*
11. Interim Removal Action Status.*
12. Evaluation of Alternate Cleanup Goals for VOCS and TPH.*
13. Evaluation of Alternate Cleanup Goals for Metals.*
14. Sampling of Water in the Storm Drains Beneath the Former TRA Facility.*
15. 1st Quarter 2009 Groundwater Monitoring Report.*
16. 3rd Quarter 2009 Groundwater Monitoring Report.*
17. 1st Quarter 2010 Groundwater Monitoring Report.*
18. 3rd Quarter 2010 Groundwater Monitoring Report.*

RECOMMENDATION: Adopt Tentative Addendum No. 4 to Cleanup and Abatement Order No. R9-2004-0258

* Supporting Documents 7 through 18 are on the enclosed CD.