

Regional Water Quality Control Board
Central Valley Region

Response to Written Comments for
Tentative Waste Discharge Requirements
for
County of Tulare
Teapot Dome Municipal Solid Waste Landfill, Tulare County

This document contains the responses to written comments received from interested parties regarding the proposed tentative Waste Discharge Requirements (WDRs) for the County of Tulare, Teapot Dome Municipal Solid Waste Landfill, Tulare County for operation and corrective action. The Tentative WDRs, R5-2014-XXXX, were prepared to incorporate operational requirements and the approved corrective action program. Currently, WDRs Order R5-2003-0015 regulates the facility.

The Tentative WDRs were circulated on 11 December 2013 for public comment, ending on 10 January 2014. A total of one letter/email was received and these comments are addressed below.

Comments submitted during the comment period were received from the following:

- A. Bryce Howard, County of Tulare, Solid Waste Department, 7 January 2014

RESPONSE TO COMMENTS

The proposed additional language in underlined and the proposed deletion of language is shown in ~~strikethrough~~ format.

Comment A.1:

Finding No. 17 [26] states in pertinent part, *"The uppermost zone is unconfined, and extends from the water table to about 120 feet below the ground surface (bgs). The upper semi-confined groundwater zone is located from approximately 140 feet to 310 feet bgs."*

Review of the January 2005 Malcom Pirnie Final EMP Report for the site states on page ES-2 in pertinent part, *"The unconfined aquifer extends vertically from the water table to approximately 110 feet below ground surface (bgs)...A contact between young alluvial deposits and older alluvial deposits occurs at approximately 110 feet. The upper 40 feet of older alluvium is defined as a leaky confining zone, which separates the unconfined aquifer from the semi-confined aquifer. The semi-confined aquifers include an upper semi-confined aquifer and a lower semi-confined aquifer. The upper semi-confined aquifer extends below the confining layer to depths of approximately 310 feet bgs. Below 300 feet, sand channels are less common, soil density is greater, and soil weathering is more extensive. This zone, herein termed the lower semi-confined aquifer, extends to depths greater than 400 feet."*

For clarity, it is suggested that the Finding read as follows, starting at the third sentence, *"Three groundwater zones have been identified beneath the facility. The uppermost zone is unconfined and extends vertically from the water table to approximately 110 below ground surface (bgs). This unconfined aquifer is underlain by a 40-foot thick leaky confining layer. Below the confining layer are upper and lower semi-confined aquifers. The upper semi-confined aquifer extends below the confining layer to approximately 310 feet bgs. The lower semi-confined aquifer is directly below the upper semi-confined aquifer and extends to over 400 feet bgs."*

Response A.1:

Comment acknowledged and approved. The recommended revisions will be made to Finding No. 26.

Comment A.2:

Finding No. 27 states in pertinent part, "...background groundwater quality for first encountered groundwater has electrical conductivity (EC) ranging between 680 and 1300 μ mohs/cm, with total dissolved solids (TDS) ranging between 440 and 790 mg/l." County review of the 1st Semi-Annual 2013 Self-Monitoring Report shows that the EC ranges between 260 (M-1S) and 1,300 (M-13A) μ mohs/cm and the TDS ranges between 200 (M-1S) and 790 (M-13A) mg/l. Please change the finding accordingly.

Response A.2:

Comment acknowledged and approved. The recommended revisions will be made to Finding No. 27.

Comment A.3:

Finding No. 38 states in pertinent part, "*The VOCs detected in groundwater at the Point of Compliance include:... 1-fluoro-1,1-dichloro-ethane...*". 1-fluoro-1,1-dichloro-ethane was determined in a 2008 sample to be a Tentatively Identified Compound (TIC) and that detection was the only time this VOC has been detected at the Point of Compliance. If the intention of the Finding is not to include TICs, please remove 1-fluoro-1,1-dichloro-ethane from the finding.

Response A.3:

Comment acknowledged and approved. Finding No. 38 will be revised to exclude 1-fluoro-1,1-dichloro-ethane.

Comment A.4:

Finding No. 40 lists the results of detection and evaluation monitoring to adequately delineate the extent and character of the release and lists the following predominate chlorinated volatile organic compounds (CVOCs): PCE, TCE, cis-1,2-DCE, trans-1,2-DCE, 1,1,2-DCE [sic], 1,1-DCA, 1,2-DCA, chloroethane, vinyl chloride, CFC-11, CFC-12, CFC-22, 1,4-DCB, 1,2-dichloropropane, chlorobenzene, and iodomethane.

In the Final EMP report for the Teapot Dome landfill dated January 2005, the first paragraph on page ES-3 lists the following CVOCs of landfill origin detected in groundwater: PCE, TCE, cis-1,2-DCE, 1,1-DCE, 1,1-DCA, chloroethane, vinyl chloride, CFC-11, CFC-12, and CFC-22. Please change the finding accordingly.

Response A.4:

Comment acknowledged and approved. The recommended revisions will be made to Finding No. 40.

Comment A.5:

Finding No. 46 states in pertinent part, "...Water from the new supply well is treated prior to use."

In a 6 September 2006 letter from your office regarding a proposed revision to the approved corrective action program at the site, the installation of a new landfill water supply well to reduce VOC concentrations was determined to be acceptable.

The letter also stated that if water from the well was only to be used for dust control over the existing footprint of the landfill, treatment of the water would not be necessary. It is suggested that the last sentence of the finding be changed to read, *“Water from the new supply well is not treated for use as dust control over the existing waste footprint because the CVOC concentrations are low (less than 10 micrograms/liter), however any other use of the water would require treatment.”*

Response A.5:

Comment acknowledged and approved. The recommended revisions will be made to Finding No. 46.

Comment A.6:

Finding No. 51 states in pertinent part, *“The Discharger submitted a 22 August 2013 cost estimate of \$0.69 million for corrective action of all known or reasonably foreseeable releases....As of 2013, the balance of the corrective action fund was \$0.69 million.”*

The original cost estimate for water corrective action at the site was submitted in 1994 and was estimated to be \$0.48 million. Since that time, adjustments for inflation have been made to bring the fund balance to the current amount of \$0.69 million. It is suggested that the finding be changed to read in pertinent part, *“The Discharger submitted a 1994 cost estimate of \$0.48 million for corrective action of all known or reasonably foreseeable releases....As of 2013, the balance of the corrective action fund was \$0.69 million.”*

Response A.6:

Comment acknowledged. The original 1994 cost estimate has been updated annually with inflation factors and this calculated value becomes the new cost estimate. Therefore, no changes will be made to Finding No. 51.

Comment A.6:

Specifications F.1. & F.2. – Both of these specifications require that reports regarding financial assurances for closure and postclosure (F.1.) and corrective action (F.2.) be submitted to the Central Valley Water Board by 1 June of each year. To be consistent with all other WDRs for Tulare County landfills, the County requests that the dates in these two specifications be changed to 1 October as well as the date of Reporting Specification B.6 on page 6 and the date for the Financial Assurances Report in the last paragraph at the bottom of page 10 in the associated Monitoring and Reporting Program.

Response A.6:

Comment acknowledged and approved. The recommended revisions will be made to the due dates for the financial assurance requirements in both the Tentative WDRs and the MRP.

Comment A.7:

Groundwater Monitoring A.1– In the table on page 2 of the MRP, the status of monitoring well M-3A is listed as Detection. M-3A is also a Corrective Action monitoring well. Please change the well status of M-3A to reflect its dual purpose.

Response A.7:

Comment acknowledged and approved. The recommended revision will be made to the status of well M-3A.

Comment A.8:

Facility Monitoring Specification 3.c. in the MRP – This specification requires that Standard Observations be conducted on a Weekly and Monthly frequency during the Wet and Dry seasons respectively. To be consistent with the MRP adopted previously for the Visalia landfill (MRP R5-2013-0059), the County requests that the frequencies be changed to Monthly and Quarterly for the Wet and Dry seasons respectively.

Response A.8:

Comment acknowledged and approved. The recommended revisions will be made to Facility Monitoring Specification 3.c.

Comment A.9:

Reporting Specification B.1 in the MRP – This specification requires that Semiannual Monitoring Reports be submitted by 1 August and 1 February. To be consistent with MRPs adopted recently for Tulare County landfills and previous requests from the County, please change these dates to 31 August and 28 February in this specification as well as the dates listed for the Semiannual Monitoring Report listed at the top of page 8 of the MRP.

Response A.9:

Comment acknowledged and approved. The recommended revisions will be made to Reporting Specification B.1.

Comment A.10:

Reporting Specification B.2 in the MRP - This specification requires that the Annual Monitoring Report be submitted by 1 February. To be consistent with MRPs adopted recently for Tulare County landfills and previous requests from the County, please change this date to 28 February in this specification as well as the date listed for the Annual Monitoring Report listed for the Annual Monitoring Report on page 9 of the MRP.

Response A.10:

Comment acknowledged and approved. The recommended revisions will be made to Reporting Specification B.2.

Comment A.11:

TABLE IV in the MRP – USEPA methods listed on Table IV appear to be from an older list of methods that is outdated. Please revise the methods listed to be consistent with MRPs adopted recently for the Visalia landfill (i.e. – most methods are now USEPA 200.8 with Mercury 254.1 and Cyanide and Sulfide SM-4500-CN or –SF (Standard Methods)).

Response A.11:

Comment acknowledged and approved. The recommended revisions will be made to Table IV.

Comment A.12:

Please change the Information Sheet accordingly to reflect changes made to the WDR and MRP as indicated above.

Response A.12:

Comment acknowledged. The aforementioned revisions will be made to the Information Sheet if applicable.