



Linda S. Adams  
Secretary for  
Environmental Protection



## Department of Toxic Substances Control

Maureen F. Gorsen, Director  
8800 Cal Center Drive  
Sacramento, California 95826-3200



Arnold Schwarzenegger  
Governor

January 10, 2007

Ms. Carol J. Carollo  
Environmental Compliance Specialist  
Chemical Waste Management, Incorporated  
Kettleman Hills Facility  
Post Office Box 471  
35251 Old Skyline Road  
Kettleman City, California 93239

CERTIFIED MAIL # 70031680000431686043

REISSUANCE OF TEMPORARY AUTHORIZATION FOR LANDFILL B-19, CHEMICAL WASTE MANAGEMENT, INC – KETTLEMAN HILLS FACILITY (KHF), KINGS COUNTY, CALIFORNIA, UNITED STATES ENVIRONMENTAL PROTECTION AGENCY (USEPA) ID NUMBER CAT 000 646 117

Dear Ms. Carollo:

The Department of Toxic Substances Control (DTSC) has received on December 11, 2006 a Class 3 permit modification request, dated December 7, 2006, and hereby reissues the June 15, 2006 temporary authorization pursuant to 22 CCR 66270.42(e)(4)(C)2 for an additional term of 180 days. The Class 3 permit modification request covers the activity in the June 15, 2006 temporary authorization, which allows KHF to modify the Class II/III cover slope from 4H:1V to 2.5H:1V. The applicable requirements of the California Environmental Quality Act have been met with respect to the reissued temporary authorization.

The reissuance of a temporary authorization represents a permit decision that may be appealed by following California Code of Regulations, title 22, section 66271.18.



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A petition may be submitted to DTSC requesting a review of the permit decision within 30 days of this letter. The appeal period will end February 8, 2007.

If you have any questions, please contact Ms. Ruth Cayabyab of my staff at (916) 255-3601.

Sincerely,

**/original signed by James M. Pappas/**

James M. Pappas, P.E., Chief  
Northern California Permitting and Corrective Action Branch

cc: Mr. Jim Dowdall  
Engineering Geologist  
Regional Water Quality Control Board  
Central Valley Region  
1685 E Street  
Fresno, California 93706

Mr. Max Weintraub  
Acting Senior Policy Advisor  
PCB Team Member  
US Environmental Protection Agency  
75 Hawthorne Street, CED-4  
San Francisco, California 94105

Mr. Lee Johnson  
Environmental Health Officer  
Kings County Department of Public Health  
Division of Environmental Health Services  
330 Campus Drive  
Hanford, California 93230



Ms. Carol J. Carollo  
January 10, 2007  
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cc: Mr. Chris Phillips  
Integrated Waste Management Specialist  
Permitting & Inspections Branch, Region 2  
California Integrated Waste Management Board  
1001 I Street  
Sacramento, California 95812

Ms. Pauline Batarseh  
Supervising Hazardous Substances Engineer  
Northern California Permitting and Corrective Action Branch  
Department of Toxic Substances Control  
8800 Cal Center Drive  
Sacramento, California 95826

Ms. Ruth Cayabyab  
Northern California Permitting and Corrective Action Branch  
Department of Toxic Substances Control  
Hazardous Substance Engineer  
8800 Cal Center Drive  
Sacramento, California 95826



## NOTICE OF EXEMPTION

To Office of Planning and Research  
State Clearinghouse  
P. O. Box 3044, 1400 Tenth Street, Room 212  
Sacramento, CA 95812-3044

From Department of Toxic Substances Control  
Northern California Permitting and  
Corrective Action Branch  
8800 Cal Center Drive  
Sacramento, CA 95826

Project Title: Chemical Waste Management, Inc. – Kettleman Hills Facility  
Reissuance of Temporary Authorization to Allow Implementation of Landfill B-19 Class II/III Waste Fill  
Side Slope Change

Project Location: 35251 Old Skyline Road  
Kettleman City, California 93239  
(Unincorporated)

County: Kings County

Project Description:

**Project Activities:**

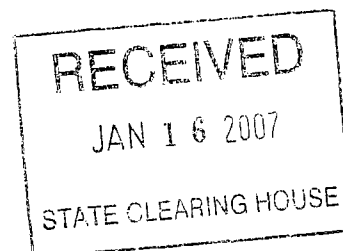
On January 10, 2007, pursuant to 22 CCR 66270.42(e)(4)(C)2, DTSC approved and reissued the June 15, 2006 temporary authorization for an additional term of 180 days. The request for a reissuance of the temporary authorization makes no changes to the June 15, 2006 temporary authorization, which allows KHF to change the Landfill B-19 Class II/III waste fill side slope from 4 units of length horizontal to 1 unit of length vertical (4H:1V) to 2.5 units of length horizontal to 1 unit of length vertical (2.5H:1V) as proposed in the addendum to the approved Landfill Unit B-19 Closure Plan. A Class 3 permit modification for a permitted authorization has been submitted for review.

The approved closure plan will continue to be followed, with the exceptions of having more "daylight" final cover area, changes in the southern portion of the stability berm configuration, and initiation of 2.5H:1V slope change in Class II/III waste fill. The applicable standards in chapter 14 of division 4.5, title 22, CCR will be followed. These changes will be incorporated into the closure construction certification report.

**Background:**

Kettleman Hills Facility (KHF) is a Class I hazardous waste treatment, storage and disposal facility and a Class II/III disposal facility, owned and operated by Chemical Waste Management Inc. (CWMI) since 1979. KHF is located in unincorporated western Kings County, California approximately 1 mile north of State Route 41 (SR-41), approximately 3.5 air miles south west of Kettleman City, 6.5 air miles southeast of the City of Avenal, and approximately 3.5 miles west of Interstate 5 (I-5). The facility is approximately 1,600-acre site, of which 499 acres are currently permitted for Class I hazardous waste and TSCA-regulated PCB waste and Class II/III waste operations. KHF is permitted to accept most hazardous wastes as identified by Title 40 of the Code of Regulations (CFR), Part 261, and California Code of Regulations (CCR) Title 22, Division 4.5 Chapter 11. Hazardous wastes are transported to KHF by truck via I-5 to SR-41. Class II/III waste disposal operations at KHF are limited to Landfill B-19.

Landfill B19 was permitted as an approximately 43-acre Class I Landfill with approximately seven million cubic yards of total capacity. Landfill consisted of four phases (IA, IB, II and III). Landfill B-19 was constructed between 1986 and 1989, and began accepting Class I waste in 1987. In 1988, after approximately one million cubic yards of Class I waste had been disposed in Phase IA, a portion of the waste and primary liner slipped, resulting in a horizontal and vertical movement of the waste prism in Phase IA. While there was movement in the waste prism, the composite liner system contained the waste so that there was no release to the environment. Subsequently, the approximately one million cubic yards of Class I hazardous waste in Phase IA was transferred to a Phase II and III of Landfill B-19. A temporary cover was placed over the slope to the floor of Phase IA to prevent rainwater from entering the remaining liner and leachate collection materials on the floor. Through 1992, approximately three million cubic yards of Class I waste had been disposed in Phases IB, II, and III. In 1992, Landfill B-19 was placed into inactive status by CWMI and Landfill Unit B-18 became the operating Waste Management Unit (WMU) at KHF. An interim cover comprising a 40-mil thick textured high density polyethylene (HDPE) geomembrane layer was placed over the Phases IB, II, and III of Landfill B-19.



In 1997, CWMI converted the remaining unused portion of the Landfill B-19 from Class I WMU to Class II designated waste and Class III Municipal Solid Waste (MSW) unit. The final fill configuration was identical to the earlier Class I fill Plan, with the exception that the balance of the fill material was Class II/III waste. The Phase IA base liner system was designed in accordance with CCR Title 27. In order to reclaim the remaining airspace in Landfill B-19, a separation liner overlying portions of the Class I waste was designed. The separation liner serves as part of the closure cover for the Class I waste to prevent the migration of rainfall, leachate, and landfill gas from the MSW into the hazardous waste.

Approximately 11 acres of Class I waste remains to be capped with the final cover. The remaining area will not be covered with MSW; however, portions will be covered by construction of the soil stability buttress, as part of the placement of the final cover. For the Class II/III portion of the Landfill B-19 evapotranspirative (ET) final cover system will be designed. The ET cover will consist of an approximately four-foot thick monolithic final cover layer of suitable soils. The monolithic cover (over the Class II/III portion) combined with the separation liner (between the Class I waste and the Class II/III waste) can be equivalent to a Title 22 cover for Class I waste. The final cover configuration still needs to be submitted and will need to be approved by the appropriate agencies in accordance with Title 22 and Title 27 requirements.

CWMI-KHF proposed on March 13, 2006 to make modifications to the Landfill Unit B-19 Class I and Class II/III Portions. These modifications were the following:

- The "daylight" final cover over the Class I waste at the southwestern corner of the landfill will be a larger area because the footprint for the Class II/III waste is to be smaller.
- The Class II/III waste fill side slope will be changed from 4 units of length horizontal to 1 unit of length vertical (4H:1V) to 2.5 units of length horizontal to 1 unit of length vertical (2.5H:1V).
- The stability buttress configuration will be amended in the southern portion due to the revised waste fill configuration (e.g., more of the berm overlaps the area of "daylight" final cover).

At a March 17, 2006 meeting involving the DTSC, KHF and KHF consultants, it was determined that the first and third changes (modifications) listed above could be implemented because of prior review and approval by DTSC. Thus, KHF sent the DTSC another letter, dated March 31, 2006, to clarify the March 13, 2006 temporary authorization request. The March 31, 2006 letter clarifies KHF may increase the amount of earthen material over the Class I final cover and for the height and width of the stability buttress at any time. However, KHF still needed DTSC approval to implement the slope change. The final grading plan includes a maximum waste elevation of 945 feet above mean sea level.

#### Other Considerations:

#### **BIOREACTOR**

For the solid waste permitting requirements, a new Joint Technical Document was reviewed and approved by other agencies (e.g., Regional Water Quality Control Board (RWQCB), Kings County Department of Public Health (the Local Enforcement Agency, LEA)) for the proposed bioreactor operation and the increase in daily tonnage limit in Landfill B-19. These other agency approvals were anticipated to be obtained months after the temporary authorization request was submitted; thus, the aforementioned changes needed to be initiated quickly in order to properly implement the closure activities that are impacted by the anticipated changes in the municipal solid waste (MSW) operations and to safely operate the MSW landfill at the 2.5H:1V slope change.

Approval to change the Class II/III waste fill side slope does not preclude approval for the proposed bioreactor. The proposed bioreactor will still need to be approved by DTSC. If the proposed bioreactor is not implemented, the landfill will be closed with the above modified project activities in place.

KHF has submitted to DTSC a Class 3 permit modification request to approval all aspects of the addendum to the closure plan. The review will require at least 105 days, at a minimum, with the 60-day comment period required by 66270.42(c)(5) and 45-day comment period required by 22 CCR 66271.9(b)(1). Thus, the temporary authorization reissuance was requested to allow the prior authorized activity in the June 15, 2006 temporary authorization to continue while the modification procedures are conducted.



Name of Public Agency Approving Project:

Department of Toxic Substances Control

Name of Person or Agency Carrying Out Project:Ms. Carol J. Carollo  
Environmental Compliance Specialist  
Chemical Waste Management, IncExemption Status (check one)

- Ministerial [PRC, Sec. 21080(b)(1); CCR, Sec. 15268]  
 Declared Emergency [PRC, Sec. 21080(b)(3); CCR, Sec. 15269(a)]  
 Emergency Project [PRC, Sec. 21080(b)(4); CCR, Sec. 15269(b)(c)]  
 Categorical Exemption: [CCR, Sec. 15301]  
 Statutory Exemptions: [State code section number]  
 General Rule [CCR, Sec. 15061(b)(3)]

Exemption Title: Minor Alterations to the Operation of an Existing FacilityReasons Why Project is Exempt:

An environmental analysis was conducted on the steepening of the final grades from 4H:1V to 2.5H:1V, with a maximum elevation of 945 feet above mean sea level. DTSC determined that the project element would be a continuation of existing disposal operations at the KHF B-19 landfill.

The project specific parameters, which limit the potential impact of the project, include the following:

1. Slope Stability

The proposed revision to the landfill final grading design results in a stable configuration under both static and dynamic loading conditions. Computed static factors of safety were higher than 1.5 for all analyzed cross-sections. The current state of practice in California for static design is to require a minimum factor of safety of 1.5 for final waste slopes and any cut or fill slopes which would impact the integrity of waste containment, affect off-site property, or endanger life.

The stability design criteria were developed to satisfy the requirements of CCR title 22, which includes an evaluation of the Maximum Credible Earthquake (MCE). The maximum permanent displacement of the cover system during an MCE is approximately 6-inches, which falls within the industry accepted allowable displacement range of 6 to 12 inches for final cover systems. A small allowable displacement is intended to preclude the possibility of large displacements that might disrupt the geosynthetic liner/cover materials.

2. Settlement

The new grades have been designed to accommodate anticipated settlement. The pre- and post-settlement grades were evaluated to demonstrate compliance with CCR title 22, which requires that a minimum of 3 percent grade be maintained on the final cover. The main consideration for post-closure grades will be secondary settlement of the existing Class I fill. Additionally, some minor uniform long-term consolidation of the bedrock and liner system is anticipated to occur. The results of settlement calculations indicate that a minimum grade of 3 percent in the direction of flow is maintained for the final cover.

3. Surface Water Impact

Closure and post-closure of the landfill will not result in significant impacts to surface water quality or an increase in downstream water flow because:

- a. The new grades will minimize flow velocity and maintain positive drainage of the landfill area.
- b. Drainage ditches situated over the landfill would be lined with low permeability soil

- c. Surface water drainage facilities have been designed to accommodate estimated flows from the Probable Maximum Precipitation (PMP) storm event, a 7.4 inch rainfall in a 24-hour duration storm, as required by CCR title 27.
- d. The storm water management system for KHF is designed to meet the Class I hazardous waste regulatory requirements in accordance with CCR title 23, which meet or exceed the Class III/III requirements for storm water management.

4. Soil Loss

The new grades will minimize erosion. A review of the amended Class I grading plan and soil loss calculations prepared by Golder Associate, Incorporated in April 11, 2006 indicates that once vegetation is established on the landfill final cover, the erosion rate is expected to be less than 1 ton/acre/year. The U.S. EPA recommends a maximum soil loss of 2 tons per acre per year for hazardous (Class I) waste landfill covers.

5. Ground Water impact

Design and change of new grades will not affect the cover or approved Groundwater Monitoring Program for KHF.

6. Transportation and Traffic Impact

Transportation and traffic will not be impacted since import of borrow soil is not necessary to change the slopes.

7. Air Quality

Design and change of new grades will not affect the approved Air Permit Requirements for Landfill B-19.

Ruth Cayabyab	Hazardous Substances Engineer	(916) 255 - 3601
Project Manager Name	Project Manager Title	Phone #
<b>/original signed by James M. Pappas/</b>		1/10/07
Branch Chief Signature		Date
James M. Pappas, P.E.	Chief, Northern California Permitting and Corrective Action Branch	(916) 255 - 3574
Branch Chief Name	Branch Chief Title	Phone #

TO BE COMPLETED BY OPR ONLY

Date Received For Filing and Posting at OPR.



## NOTICE OF A TEMPORARY AUTHORIZATION DECISION

Chemical Waste Management, Inc.  
Kettleman Hills Facility  
Kettleman City, California  
January 2007



The Department of Toxic Substances Control (DTSC) has approved a reissue of the Temporary Authorization for the hazardous waste management facility at:

Kettleman Hills Facility  
35251 Old Skyline Road  
Kettleman City, California 93239

This reissue renews the earlier Temporary Authorization. On December 11, 2006, Chemical Waste Management Inc. requested a Class 3 permit modification and sent a notice to the public starting a public comment period on the Class 3 permit modification request. As also outlined in the Class 3 permit modification request, the Temporary Authorization will allow Chemical Waste Management, Inc. to change the cover slope at Landfill B-19 from 4 to 1 to an effective 3 to 1.

This facility operates under a Hazardous Waste Facility Permit that expires in June 2013. As required by regulations, DTSC must review all temporary authorization requests and make a decision based on the merits. The temporary authorization is to allow Chemical Waste Management, Inc. to change the cover slope at Landfill B-19. This slope change creates more surface area at the top of Landfill B-19. It is part of a proposed addendum to the currently approved Landfill Unit B-19 Closure Plan.

DTSC also finds that the design changes are exempt from the requirements of the California Environmental Quality Act under California Code of Regulations, title 14, section 15301 pertaining to minor alteration of an existing facility. The temporary authorization documents are available at the following locations:

Avenal Library  
Reference Department  
501 King Street  
Avenal, CA 93204  
(559) 386-5741

Hanford Library  
401 North Douty Street  
Hanford, CA 93230  
(559) 582-0261

Kettleman City Library  
106 Becky Pease Street  
Kettleman City, CA 93239  
(559) 386-9804

The reissue of a temporary authorization represents a permit decision that you may appeal by following California Code of Regulations, title 22, section 66271.18. You may submit a petition to DTSC requesting a review of the permit decision within 30 days of this notice. The appeal period will end on February 22, 2007. Petitions must be postmarked no later than February 22, 2007, and sent to:

Mr. Watson Gin, P.E., Deputy Director  
Hazardous Waste Management Program  
California Department of Toxic Substances Control  
P.O. Box 806  
Sacramento, California 95812-0806

You should also send a copy of your petition to:

Mr. James M. Pappas, P.E., Chief  
Northern California Permitting and Corrective Action Branch  
Department of Toxic Substances Control  
8800 Cal Center Drive  
Sacramento, CA 95826

For further information about this decision, please contact:

Nathan Schumacher  
Public Participation Specialist  
8800 Cal Center Drive  
Sacramento, CA 95826  
(916) 255-3650  
NSchumac@dtsc.ca.gov

Ruth Cayabyab  
Project Manager  
8800 Cal Center Drive  
Sacramento, CA 95826  
(916) 255-3601  
RCayabya@dtsc.ca.gov

If from the media, please contact Ron Baker, Public Information Officer, at (916) 324-3142 or [RBaker@dtsc.ca.gov](mailto:RBaker@dtsc.ca.gov).

The full administrative record may be reviewed at the DTSC file room:

DTSC  
8800 Cal Center Drive  
Sacramento, CA 95826  
To make arrangements, please contact Ruth Cayabyab at 916-255-3601.

#### **NOTICE TO THE HEARING IMPAIRED.**

You can obtain additional information by using the California State Relay Service at 1-888-877-5378 (TDD). Ask them to contact Nathan Schumacher at (916) 255-3650 regarding the Kettleman Hills Facility.



## AVISO DE UNA DECISIÓN DE AUTORIZACIÓN TRANSITORIA

Chemical Waste Management, Inc.  
Instalación Kettleman Hills  
Kettleman City, California  
Enero 2007



El Departamento de Control de Sustancias Tóxicas (DTSC, por sus siglas en inglés) ha aprobado la re emisión de una Autorización Transitoria para la instalación de desechos peligrosos en:

Kettleman Hills Facility  
35251 Old Skyline Road  
Kettleman City, California 93239

La re emisión renueva la Autorización Transitoria otorgada anteriormente. El 11 de Diciembre del 2006, Chemical Waste Management, Inc., solicitó que se modificara el permiso Clase 3, para cuyo efecto envió un aviso al público y al mismo tiempo se fijó el plazo para los comentarios públicos respecto a la solicitud para modificar el permiso Clase 3. Como también se resume en la solicitud para modificar el permiso Clase 3, la Autorización Transitoria permitirá a Chemical Waste Management, Inc., cambiar la cubierta de la pendiente en el Vertedero B-29 de 4 a 1 a un 3 a 1 actual.

Esta instalación realiza sus operaciones conforme a un Permiso Para Instalaciones de Desechos Peligrosos el cual caduca en Junio del 2013. En conformidad con lo dispuesto por los reglamentos, a DTSC le compete estudiar todas las solicitudes de autorizaciones transitorias y tomar una decisión al respecto basándose en los méritos de las mismas. La finalidad de la Autorización Transitoria es permitir a Chemical Waste Management, Inc. cambiar la cubierta de la pendiente en el Vertedero B-19. Esta modificación a la pendiente da lugar a que se extienda el área de la superficie en la parte superior del Vertedero B-19 y forma parte de la adición que se propone para el Plan de Clausura de la Unidad Vertedero B-19, el cual en la actualidad está aprobado.

Asimismo, DTSC es de la opinión que las modificaciones al diseño están exentas de los requerimientos dispuestos por el Decreto de Calidad Ambiental de California según el título 14, artículo 15301 del Código de Reglamentos de California, en lo que respecta a alteraciones de menor envergadura en una instalación existente. Los documentos relacionados con la Autorización Transitoria están disponibles en los siguientes lugares:

Biblioteca Avenal  
Oficina de Referencias  
501 King Street  
Avenal, CA 93204  
(559) 386-5741

Biblioteca Hanford  
401 North Douty Street  
Hanford, CA 93230  
(559) 582-0261

Biblioteca de Kettleman City  
106 Becky Pease Street  
Kettleman City CA 93239  
(559) 386-9804

Según las disposiciones del título 22, artículo 66271.18 del Código de Reglamentos de California usted puede interponer un recurso de apelación en lo que se refiere a la decisión de re emitir el permiso dentro de 30 días a contar de la fecha de este aviso, solicitando que se revise la decisión tomada acerca del permiso. El plazo para interponer la apelación terminará el 22 de Febrero del 2007. Las solicitudes de apelación deben estar franqueadas a más tardar el 22 de Febrero del 2007 y deben enviarse a:

Mr. Watson Gin, P.E., Sub Director  
Programa de Administración de Desecho Peligroso  
Departamento de Control de Sustancias Tóxicas de  
California  
P.O. Box 806  
Sacramento, California 95812-0806

Asimismo, envíe una copia de su solicitud a:

Mr. James M. Pappas, P.E., Jefe  
Oficina de Permisos y Acción Correctiva del Norte de  
California  
Departamento de Control de Sustancias Tóxicas  
8800 Cal Center Drive  
Sacramento, CA 95826

Si desea obtener información adicional respecto a esta decisión, por favor contacte a:

Nathan Schumacher  
Especialista en Participación Pública  
8800 Cal Center Drive  
Sacramento, CA 95826  
(916) 255-3650  
NSchumac@dtsc.ca.gov

Ruth Cayabyab  
Gerente de Proyecto  
8800 Cal Center Drive  
Sacramento, CA 95826  
(916) 255-3601  
RCayabya@dtsc.ca.gov

Todo el expediente administrativo puede revisarse en la oficina de archivos de DTSC:

DTSC  
8800 Cal Center Drive  
Sacramento, CA 95826

Por favor llame a Ruth Cayabyab al 916-255-3601 para hacer los arreglos correspondientes.

## **AVISO A PERSONAS CON PROBLEMAS AUDITIVOS**

Usted puede obtener información adicional utilizando el Servicio de Relevo del Estado de California llamando al 1-888-877-5378 (TDD). Pida que se le comuniquen con Nathan Schumacher al (916) 255-3650 respecto a la Instalación Kettleman Hills.