BEFORE THE HAZARDOUS MATERIALS AND WASTE MANAGEMENT DIVISION
COLORADO DEPARTMENT OF PUBLIC HEALTH AND ENVIRONMENT
STATE OF COLORADO

COMPLIANCE ORDER ON CONSENT Number 99-09-24-01

IN RE THE MATTER OF ROCKY FLATS ENVIRONMENTAL TECHNOLOGY SITE

This Compliance Order on Consent ("Consent Order") is issued and entered into by and among the Colorado Department of Public Health and Environment, Hazardous Materials and Waste Management Division (the "Department") pursuant to the Department's authority under §25-15-308(2), C.R.S. of the Colorado Hazardous Waste Act (the "Act"), §25-15-301, et seq., and the Colorado Hazardous Waste Regulations, 6 CCR 1007-3 (the "Regulations"); the United States Department of Energy ("DOE"); Kaiser-Hill Company, L.L.C. ("K-H"); Safe Sites of Colorado, L.L.C. ("SSOC"); and Rocky Mountain Remediation Services, L.L.C. ("RMRS"). The Department, DOE, K-H, SSOC and RMRS may be collectively referred to as the "parties." This Consent Order arises out of activities conducted at the Rocky Flats Environmental Technology Site in Golden, Colorado (the "RFETS" or the "Facility").

STATEMENT OF PURPOSE

1. The objectives of the parties in entering into this Consent Order are to:

   a. modify in its entirety that certain Settlement Agreement and Compliance Order on Consent, number 93-04-23-01, as modified on July 1, 1995 (the "MR Consent Order") thereby substituting this Consent Order for the MR Consent Order;
   b. establish requirements for certain activities involving mixed residues management; and
   c. establish enforceable commitment dates.

BACKGROUND INFORMATION and FACILITY DESCRIPTION

The following constitute the factual and legal determinations that the Department considers as the basis for this Consent Order.

2. Pursuant to §3006(b) of the Resource Conservation Recovery Act ("RCRA"), 42 U.S.C. §6962(b), on November 2, 1984, the Administrator of the United States Environmental Protection Agency ("EPA") authorized the State of Colorado to administer and enforce the state hazardous waste program in lieu of the federal program. The EPA authorized

the state to administer and enforce certain portions of the Hazardous and Solid Waste Amendments Act on July 14, 1989.

3. The Facility is located in northern Jefferson County, Colorado, approximately sixteen miles northwest of Denver, and it is owned by the United States.

4. The Facility is part of the DOE nuclear weapons complex. The United States Atomic Energy Commission, a predecessor agency to the DOE, established the Facility in 1951 and began operations in 1952. The Facility was used to produce components for nuclear weapons until 1989, at which time DOE placed the Facility in a stand by condition. In 1994, the DOE determined this Facility was no longer needed and would be closed. The Facility is operated by DOE and its contractors.

5. DOE, an agency of the United States, is subject to state regulation of its hazardous waste management activities pursuant to §6001 of RCRA, 42 U.S.C. §6961. DOE is the "owner" of RFETS, a "hazardous waste facility," as those terms are defined in 6 CCR 1007-3, §260.10. RFETS has a permit for treatment and storage of hazardous waste.

6. On or about August 18, 1980, DOE and its then contractor, Rockwell International, submitted a Notice of Hazardous Waste Activity to the EPA pursuant to §3010 of RCRA. DOE and Rockwell identified themselves as engaged in the generation, treatment, storage and/or disposal of hazardous waste at the Facility. On or about November 14, 1980, DOE and Rockwell submitted a RCRA Part A application to EPA to qualify for RCRA interim status. DOE and Rockwell International subsequently submitted a RCRA Part B application to the Department, and the Department issued a Part B permit to DOE and its then contractor, EG&G Rocky Flats, Inc. ("EG&G"). The Department issued the current Part B permit governing the Facility on June 30, 1996.

7. In January 1990, EG&G replaced Rockwell International as DOE's management and operating contractor for the Facility.

8. The following subparagraphs of this paragraph were originally included in the MR Consent Order as paragraphs five through thirteen, twenty-two, and twenty-three, and are incorporated herein as findings and conclusions of this Consent Order. As used in these subparagraphs, the phrase "Plant" means "RFETS" and "CDH" is the predecessor agency of "CDPHE."

   a. "Some of the mixed wastes generated by the Plant are classified by DOE as 'mixed residues.' Because DOE intended to recover certain valuable materials, including plutonium, from the mixed residues, it had considered them not regulated under the hazardous waste laws.

   b. "On August 9, 1989, CDH issued a notice of violation ('NOV') under the CHWA [Act] relating to the mixed residues that were in storage at the Plant as of that date.

c. "In response to this NOV, DOE and CDH entered into Settlement Agreement and Compliance Order on Consent No. 89-10-30-01 on November 3, 1989 ('November 1989 Order'), establishing a responsible approach to identification, classification and management of the mixed residues then in storage.

d. "On April 12, 1990, the District Court for the District of Colorado granted Sierra Club's motion for partial summary judgment in Sierra Club v. DOE, No. 89-B-181 (D. Colo.), finding that certain of the residues at the Plant are RCRA hazardous wastes.

e. "On September 28, 1990, DOE submitted the Mixed Residue Compliance Plan to CDH pursuant to the November 1989 Order.

f. "On July 31, 1991, CDH issued Compliance Order No. 91-07-31-01 ('July 1991 Order'), approving sections 3.0 through 6.0 of the Mixed Residue Compliance Plan with conditions, and disapproving section 7.0 in its entirety.

g. "The July 1991 Order, inter alia, established a schedule for DOE to perform specified actions to bring the mixed residues then in storage into compliance with 6 CCR 1007-3, Part 265; to submit a CHWA permit application for storage and treatment of those mixed residues pending their removal from the Plant; and to submit a report by February 1, 1992, describing a program to reduce the inventory of those mixed residues at the Plant and a schedule for implementation. The mixed residues in storage at the time the July 1991 Order was issued shall be referred to hereafter as the 'backlog mixed residues' and are those mixed residues listed by item description code ('IDC') on Exhibit A attached hereto [i.e., attached to the MR Consent Order].

h. "On August 1, 1991, CDH filed suit against DOE in Civil Action No. 91-B-1326 in the United States District Court for the District of Colorado. The suit sought a court order compelling DOE to comply with the July 1991 Order. CDH's motion to consolidate its action with Sierra Club v. DOE, No. 89-B-181 (D. Colo.), was denied on August 6, 1991.

i. "On August 13, 1991, the District Court for the District of Colorado ruled in Sierra Club v. DOE, No. 89-B-181 (D. Colo.), that DOE was storing certain mixed residues without interim status or a permit from CDH or the Environmental Protection Agency. The Court entered judgment on August 13, 1991, and then entered an Amended Judgment on August 22, 1991, directing DOE to obtain a permit for those mixed residues within two years from the date of its order, or August 22, 1993.

j. "DOE's storage of backlog mixed residues without a permit or interim status is a violation of § 25-15-308, C.R.S. (1989 & 1992 Supp.).

k. "The Mixed Residue Compliance Plan submitted on September 28, 1990, did not meet the requirements of the November 1989 Order, as detailed in Attachment A of the July 1991 Order. Consequently, DOE violated the November 1989 Order."

9. In 1993, the Department, DOE and EG&G entered into the MR Consent Order, governing the management of mixed residues at RFETS. Pursuant to the MR Consent Order's requirements, DOE and EG&G developed a Mixed Residue Tank Management Plan ("MR Tank Management Plan"), which EG&G and then K-H and SSOC implemented. The MR Consent Order provided that DOE would either submit permit applications for mixed residue tanks, or would manage such tanks in compliance with management standards approved in the MR Tank Management Plan until the tanks were closed. Presently, no MR tanks are contained in the RFETS Part B permit. The tanks identified in the MR Tank Management Plan are either "operationally empty" or "RCRA Stable," as those terms are defined in the current Part B permit. These tanks are being managed in accordance with the MR Tank Management Plan, and will be closed in accordance with paragraph 19.

10. In February 1994, and again in August 1994, the United States District Court for the District of Colorado in Sierra Club v. DOE, Case No. 89-B-181, entered orders establishing schedules for DOE to submit information related to the permitting of solid mixed residue units. DOE met the schedules established in these orders. Subsequently, on February 6, 1995 and October 25, 1995, the Department issued permits for the mixed residue container storage units. All solid mixed residues now at RFETS are stored in permitted units.

11. In October 1992, Congress adopted the Federal Facility Compliance Act, Pub. L. No. 102-386 (the "FFCA"), which amended RCRA's waiver of sovereign immunity, section 6001, by extending it to include civil and administrative penalties for violations of state hazardous waste laws. The Act also made explicit that the waiver extends to administrative orders and all aspects of hazardous waste management. The FFCA also directed DOE to develop mixed waste treatment plans for each of its facilities for approval by the appropriate regulatory authority. The FFCA authorizes the Department to waive the requirement for a mixed waste treatment plan at RFETS, if DOE and the Department enter into an agreement addressing compliance with RCRA section 3004(j), 42 U.S.C. section 6924(j), for the mixed waste at RFETS, and the Department issues an order requiring compliance with the agreement. The MR Consent Order constituted such an agreement and order for the mixed wastes within its scope.

12. On July 1, 1995, K-H assumed certain responsibilities at the Facility pursuant to its contract with DOE. K-H, as an integrating management contractor for DOE, subcontracts various functions to other contractors, including SSOC and RMRS. K-H and some of its subcontractors, including SSOC and RMRS, have certain responsibilities for hazardous waste management at the Facility.

13. Since July 1, 1995, DOE, K-H and certain of its subcontractors have operated the Facility. DOE, K-H, SSOC and RMRS are each "operators" of RFETS, as that term is defined in 6 CCR 1007-3, §260.10.

14. The MR Consent Order was modified on July 1, 1995 to substitute K-H and SSOC for EG&G.

15. The Department, the United States Environmental Protection Agency ("EPA") and DOE entered into the Rocky Flats Clean Up Agreement ("RFCA") on July 19, 1996, which establishes the requirements for remediation and corrective actions to achieve Facility closure. Congress created the Defense Nuclear Facilities Safety Board in 1988, 42 U.S.C. section 2286, to oversee the safety of DOE's nuclear operations. To advance RFCA's purposes, the Department, the EPA, DOE and the Defense Nuclear Facilities Safety Board (the "Board") entered into a Memorandum of Understanding ("MOU"). In the MOU, the Department, the EPA and the Board acknowledged that their authorities to oversee and regulate DOE's activities at RFETS overlap, and they agreed, among other things, to integrate their jurisdictional roles at RFETS. The MOU does not impair any agency's regulatory authority.

ORDER ON CONSENT

16. Pursuant to 42 U.S.C. section 6939c(b)(5), the Department hereby waives the requirement for DOE to submit a plan required by 42 U.S.C. section 6939c(b)(1) with respect to the mixed residues contained in tanks and identified in the MR Tank Plan, the solid mixed residues identified in Appendix A attached hereto, and the transuranic mixed ("TRM") wastes generated by their processing . The Department and DOE intend for this Order to fulfill the requirements of 42 U.S.C. section 6939c(b)(5) for an agreement and order addressing compliance with RCRA's section 3004(j), 42 U.S.C. section 6924(j).

17. Pursuant to its authority under the Act, the Department orders DOE, K-H, SSOC and RMRS to comply with the following Compliance Order Requirements, and DOE, K-H, SSOC and RMRS agree to do so.

COMPLIANCE ORDER REQUIREMENTS

18. Because of RFCA and work completed since July 1, 1995, certain aspects of the MR Tank Management Plan are no longer applicable. The Parties have agreed to replace the MR Tank Management Plan with the MR Tank Plan. Therefore, upon the effective date of this Consent Order, DOE, K-H, SSOC and RMRS shall comply with the requirements of the MR Tank Plan. As used in this Order, the phrase "Requirements of the MR Tank Plan" means sections seven and eight of the MR Tank Plan.

19. All tanks identified in the MR Tank Plan shall be closed pursuant to a RCRA Closure Description Document, as described in the approved Closure Plans, or pursuant to a RFCA decision document. Once a Closure Description Document or RFCA decision document is approved by the Department, this Consent Order shall terminate as to the tank or tanks identified in the document and the listing of tanks in the MR Tank Plan shall be modified accordingly. The MR Tank Plan may be updated annually or as the project managers may deem appropriate. The Department must approve updates that alter Requirements of the MR Tank Plan.

20. Upon the effective date of this Consent Order, DOE, K-H, SSOC and RMRS shall manage in accordance with RCRA and the Act the solid mixed residues identified in Appendix A attached hereto. Management of the mixed residues is subject to both Department and Board oversight. The Board has established dates for stabilizing different categories of the mixed residues. To minimize the possibility of conflicting deadlines, the Department agrees that it will not establish enforceable commitment dates for treating solid or liquid mixed residues, unless (1) the Department, in its discretion, determines that the Board (or any successor entity having the same or greater authority over DOE) has failed to exercise its authority to assure the solid mixed residues are dispositioned in accordance with the Board's 94-1 recommendation, as it may be modified from time to time; or (2) the Board is dissolved and not replaced with another entity external to DOE that has the same or greater authority over DOE. If the Department determines that either condition in the preceding sentence exists, it shall provide written notice to DOE, K-H, SSOC and RMRS thirty days before taking any action to establish any such enforceable commitment dates. The notice shall describe the reasons for the Department's determination that either condition exists. If requested by any other Party, the Department agrees to discuss in good faith its concerns.

21. The Department may propose enforceable commitment dates any time after the thirty-day notice period described in the preceding paragraph has expired. The Department will not act to finalize such proposed dates until thirty days after proposing them. Upon the request of any other party, the Department agrees to discuss in good faith the proposed dates. The Department's unilateral establishment of enforceable commitment dates for treating solid or liquid mixed residues shall constitute a modification of this Consent Order.

22. At the same time it is submitted to DOE, K-H shall submit to the Department, for information purposes only, a copy of the monthly progress report for the Implementation Plan ("IP") for Board Recommendation 94-1, or any successor plan describing the disposition of solid mixed residues.

23. The Department shall not establish any enforceable commitments under this Order for the removal from RFETS of any mixed residues or any wastes generated from the treatment of mixed residues. However, the Department may establish RFCA milestones for removal from RFETS of mixed residues and wastes generated from the treatment of mixed residues. DOE, K-H, RMRS and SSOC agree not to challenge the Department's

jurisdiction to impose any such milestones. DOE may dispute such milestones under the RFCA dispute resolution provisions in the same manner as any other RFCA milestone. In any such dispute, the Department shall be considered the "Lead Regulatory Agency," as that term is defined in RFCA.

24. Upon request by the Department, a project managers' meeting will be held to discuss the status of the mixed residues governed by this Consent Order.

FUNDING PROVISIONS

25. In RFCA, the Department and DOE recognized that many activities at RFETS are interrelated, and efficient use of tax dollars demands integrated management and regulation of all RFETS activities. To further that goal, the RFCA parties agreed to procedures for meaningful regulator involvement in RFETS' budget planning and prioritization, even for activities not regulated under RFCA. To implement these procedures effectively, the Department agreed to coordinate its decisions under permits, orders and agreements not regulated under RFCA with the budgeting planning procedures set forth in RFCA. See RFCA paragraph 63. Consistent with RFCA paragraph 63, the Department will coordinate its regulatory decisions under this Consent Order through the RFCA budget planning process. The phrase "regulatory decisions" does not include any enforcement action that the Department may choose to bring. Nothing in this paragraph limits or impairs the Department's authority to impose requirements it believes necessary to protect human health or the environment, or otherwise ensure compliance with regulatory requirements.

26. In any administrative or judicial proceeding seeking to enforce the requirements of this Consent Order, the parties agree DOE may raise as a defense the unavailability of appropriated funds caused a failure or delay. In particular, nothing herein shall be construed as precluding DOE from arguing either that the unavailability of appropriated funds constitutes a force majeure, or that no provisions of this Consent Order shall be interpreted to require the obligation or payment of funds in violation of the Anti-Deficiency Act, 31 U.S.C. §1301 or 1341, or the Atomic Energy Act, 42 U.S.C. §2201, et seq. While the Department disagrees that an Anti-Deficiency Act defense or any other defense based on lack of funding exists, the Department and the DOE agree the issue is not ripe for adjudication.

IMPLEMENTATION OF AND CHANGES TO WORK TO BE PERFORMED/CONSULTATIVE PROCESS

27. Each party shall designate, in writing, within ten business days of the effective date of this Consent Order, a project manager. Any party may change its project manager by notice to the other parties.

28. Nothing in this Consent Order shall be construed to limit in any manner the Department's authority to address an imminent and substantial endangerment to human health and the environment at the Facility. In such an event, the Department shall provide prompt notice to the other parties. For purposes of this paragraph, notice may be made by telephone to DOE's Manager for the Rocky Flats Field Office, RFETS' Shift Superintendent, the President or counsel of any of the other parties. To the extent possible, the Department's personnel shall make reasonable attempts to notify all other parties immediately. As soon as practical thereafter, the parties shall enter into good faith discussions to try to resolve the Department's concerns.

29. The parties expressly acknowledge their intent to minimize disputes by participating in a consultative process for all requirements under this Consent Order, including documents, modifications to documents, and changes to enforceable commitment dates requiring the Department's approval. The parties acknowledge the difficulty of planning and implementing work at the Facility because of the presence of radioactive constituents, particularly in a project of this magnitude. The parties agree to try to resolve problems as early and as quickly as possible, recognizing that this depends on frequent and effective communication between each party's project manager, and the effective use of the processes described in this Consent Order.

30. An enforceable commitment date shall be changed upon the Department's determination that good cause exists. A request for a change shall be submitted in a timely fashion in writing and shall include:

    a. the commitment date to be changed,
    b. the length of the change,
    c. the cause for the change, and
    d. any related regulatory milestone or enforceable commitment date that may be affected if the change is granted.

31. Good cause includes the following:

    a. a force majeure event;
    b. a delay caused or likely to be caused by granting a change to another regulatory milestone or enforceable commitment date; and
    c. anything else mutually agreed to by the parties as constituting good cause.

32. A force majeure is defined as any event arising from causes that are unexpected or not reasonably foreseeable, are beyond the control of DOE, K-H, SSOC or RMRS, cannot be avoided or overcome by due diligence, and which causes a delay in or prevents the performance of an obligation. Examples of events that may constitute force majeure include: (i) any strike or other labor dispute not within the control of the Parties affected thereby, and (ii) failure to obtain, after timely application and exercise of due diligence, a necessary permit or other authorization due to the action or inaction of a governmental agency other than DOE.

33. Within thirty calendar days of learning that an enforceable commitment date may require an extension of time, DOE's or K-H's project manager shall submit a written request for a delay to the Department. The request shall explain the reason for the delay, and the plans for or results of actions taken to mitigate the delay. The Department's project manager shall respond to the request as soon as is reasonably practicable but no later than fourteen calendar days after the request is made. If the Department's project manager agrees the delay is due to good cause, the enforceable commitment date shall be changed. If the Department's project manager rejects the request for an extension of time or disagrees with proposed plans for mitigation actions, the Department shall provide DOE and K-H with a written explanation of its determination, specifically setting forth its reasons. DOE, K-H, SSOC or RMRS may refer the issue, in whole or part, to dispute resolution in accordance with the provisions below.

34. DOE's or K-H's project manager may request modifications to any document required now or in the future by this Consent Order by providing a draft of the revised document to the Department's project manager. The project managers shall meet, discuss and resolve, to the extent possible, the Department's comments, if any. If all comments are resolved, the document shall be submitted to the Department with a letter stating the document has been pre-approved by the Department' project manager. If all comments are not resolved, the document shall be submitted to the Department in accordance with the following paragraph. Any document submitted for information purposes only does not require the Department's approval. Therefore, the process described in this paragraph does not apply to such documents.

35. The procedures in this paragraph apply to any document, including any modification to a document, that requires the Department's approval. The parties shall utilize a consultative process to develop and agree upon the contents of such documents and modifications before formally submitting them to the Department. After this consultative process, DOE or K-H shall submit the document to the Department for its determination. Within twenty-one business days of the document's delivery to the Department, the Department shall do one of the following: (a) approve the document, (b) approve the document with modifications, or (c) disapprove the document. The Department's written notification shall provide sufficiently specific comments to allow appropriate changes to be made, and shall specify a reasonable time in which to re-submit the revised document. In the event DOE, K-H, SSOC or RMRS disagrees with the Department's determination disapproving or approving a document with modifications, the issue may be referred to dispute resolution in accordance with the provisions below.

36. A timely request for a change to an enforceable commitment date shall toll any assessment of administrative penalties or any application for judicial enforcement of the affected enforceable commitment date until a decision is reached on whether the requested change will be approved. If dispute resolution is invoked and the requested change is denied, penalties may be assessed and may accrue from the date of the original enforceable commitment date. Following the grant of a change, the enforceable commitment date can only be enforced as most recently changed.

37. In computing any period of time prescribed or allowed under this Consent Order, the day of the act or event from which the period of time begins to run shall not be included. The last day of the period computed shall be included, unless it is an Alternate Work Schedule ("AWS") day off at RFETS, a Saturday, a Sunday, or a legal holiday. In such event, the period runs until the end of the next business day. Similarly, if a specified date in this Consent Order falls on an AWS, a Saturday, a Sunday or a legal holiday, the requirement shall be due by the end of the next business day. For purposes of computing time under this Consent Order, the legal holidays are as follows: the first day of January, observed as New Year's Day; the third Monday in January, observed as Martin Luther King Day; the third Monday in February, observed as President's Day; the last Monday in May, observed as Memorial Day; the fourth day of July, observed as Independence Day; the first Monday in September, observed as Labor Day; the second Monday in October, observed as Columbus Day; the 11th day of November, observed as Veterans Day; the fourth Thursday in November, observed as Thanksgiving Day; and the 25th day of December, observed as Christmas Day.

FACILITY ACCESS AND SAMPLING

38. The Department shall be permitted to oversee any and all work being performed under this Consent Order. The Department shall be permitted access to the Facility at any time work is being conducted pursuant to this Consent Order, and during reasonable business hours when work is not being conducted, for purposes of determining DOE's, K-H's, SSOC's and RMRS's compliance with this Consent Order. The Department shall be permitted to inspect the work site, operating and field logs, contracts, manifests, shipping records, and records and documents relevant to any requirement under this Consent Order. To facilitate access to any particular building at the Facility, the Department shall provide DOE's or K-H's project manager with reasonable prior notice.

39. The Department may conduct any tests necessary to ensure compliance with this Consent Order and to verify the data submitted by DOE, K-H, SSOC or RMRS. The Department's project manager shall advise DOE's or K-H's project manager if the Department desires split samples.

40. The Department's access and activities contemplated hereunder shall be subject to the applicable requirements of the Atomic Energy Act, 42 U.S.C. § 2011, et seq., and Executive Orders concerning the handling of unclassified controlled nuclear information, restricted data and national security information, including the "need to know" requirements.

41. Nothing in this Consent Order shall limit the existing legal authority of the Department to inspect the Facility, seek information, gather data or take samples. The Department reserves its rights to seek access to any information or facilities in accordance with applicable law.

42. Nothing in this Consent Order shall be construed to waive or limit any attorney-client or accountant-client privilege which any party may be entitled to assert.

DISPUTE RESOLUTION

43. The Senior Executive Committee ("SEC") shall attempt to resolve disputes in accordance with the provisions of this section. The SEC shall be comprised of the following three members: the Department's Director of the Hazardous Materials and Waste Management Division, DOE's Manager for the Rocky Flats Field Office, and K-H's President. At their discretion, the Presidents of RMRS and SSOC may participate in the SEC. The parties intend for the SEC members to implement their responsibilities personally.

44. The consultative process, as outlined above, must be followed before dispute resolution is initiated. DOE, K-H, SSOC or RMRS may initiate dispute resolution for the following matters:

    a. modifications to this Consent Order;
    b. disapproval or approval with modifications of a document, including modifications to a document, required under this Consent Order;
    c. complete or partial denial of a request for extension of an enforceable commitment date;
    d. the Department's unilateral establishment of enforceable commitment dates for the solid mixed residues; and
    e. a determination by the Department that DOE, K-H, SSOC or RMRS has violated this Consent Order.

45. An issue may not be disputed more than once, even if it falls under more than one of the categories of disputable matters listed in the preceding paragraph, or moves from one category to another. Disputes over enforceable commitment dates established pursuant to paragraph 21 shall skip the process described in the following paragraph and proceed directly to the SEC. In such a case, the disputing parties shall, within 5 days of receipt of the Department's decision, send to the SEC members a written statement specifically describing the dispute and the rationale for that Party's position.

46. DOE, K-H, RMRS or SSOC must invoke dispute resolution within five business days of receipt of the Department's written determination. The disputing party shall initiate dispute resolution by sending a written notice of dispute to the other parties specifically stating the issue being disputed. The parties' project managers shall meet within seven business days of receipt of the notice to discuss the disputed matter. If the disputed matter is not resolved, each party desiring to take a position in the dispute shall, within five business days of the meeting, deliver to the other parties a written statement specifically describing the dispute and setting forth that party's position and supporting rationale. Each party shall then have five business days to respond to the other parties' positions. Documents necessary to support a party's position may be attached to the

notice of dispute, position statement or response. A copy of all documents shall be delivered to each member of the SEC. A party's failure to deliver a timely written notice of dispute shall constitute a waiver of the party's right to dispute an issue.

47. Within seven business days after receipt of the written statements of dispute pursuant to paragraph 45 or 46, as applicable, the SEC shall meet, exert its best efforts to resolve the dispute and issue a written decision. If a unanimous resolution of the dispute is not reached within five business days, the Department's SEC member shall issue a written decision. The written decision of the SEC, or of the Department's SEC member, as appropriate, constitutes final resolution of the dispute. Resolution of a dispute that does not involve a finding of violation of a requirement of the Colorado Hazardous Waste Act is a final agency action subject to appeal in accordance with section 25-15-305, C.R.S. Resolution of a dispute that does involve a finding of violation of a requirement of the Colorado Hazardous Waste Act shall be subject to appeal in accordance with section 25-15-308, C.R.S.

48. If DOE, K-H, SSOC or RMRS initiates dispute resolution, the Department agrees to participate fully in the process and to forego initiating any administrative or judicial enforcement action with respect to the disputed matter until the dispute resolution process is completed or upon mutual agreement of the parties in settlement of the dispute. Initiation of dispute resolution shall not toll or impair any enforcement action already filed by the Department against DOE, K-H, SSOC or RMRS, nor shall it toll or impair the Department's ability to file enforcement actions against DOE or K-H for activities not covered by this Consent Order.

AGREEMENT TO ORDER ON CONSENT

49. DOE, K-H, SSOC and RMRS agree to the terms and conditions of this Consent Order, and each agrees not to challenge:

    a. the issuance of this Consent Order;
    b. the factual and legal determinations made by the Department herein in any action enforcing or construing the terms and conditions herein; or
    c. the Department's authority to bring, or the court's jurisdiction to hear, any action to enforce the requirements of this Consent Order under the Act.

50. Notwithstanding anything to the contrary herein, DOE, K-H, SSOC and RMRS do not admit to any of the factual and legal determinations made by the Department herein, and any action undertaken by DOE, K-H, SSOC and RMRS pursuant to this Consent Order shall not constitute an admission of liability by any of them with respect to the conditions of the Facility. DOE, K-H, SSOC and RMRS also reserve their rights to contest any factual or legal determination, and to assert defenses regarding liability in any proceeding other than one brought to enforce or construe this Consent Order. Except as provided in

paragraph 49, DOE, Kaiser-Hill, SSOC and RMRS also reserve their rights to assert defenses regarding future alleged violations under this Consent Order.

51. DOE does not, by entering into this Consent Order, waive any claim of sovereign immunity it may have that is not expressly waived by statute; nor does it waive any claim of jurisdiction over matters reserved to it under the Atomic Energy Act.

SCOPE AND EFFECT OF ORDER ON CONSENT

52. This Consent Order applies only to and requires compliance for hazardous wastes and the hazardous waste component of mixed waste located in tanks or ancillary equipment to the tanks identified in the MR Tank Plan, the solid mixed residues identified in Appendix A, and for purposes of 42 U.S.C. section 6939c(b)(5), the TRM wastes generated from their processing. This Consent Order does not apply to the radioactive component of mixed waste, which is managed by DOE pursuant to the Atomic Energy Act, 42 U.S.C. §2011, et seq.

53. This Consent Order shall be effective upon the date signed by the last party. In the event a party does not sign this Consent Order within twenty-one business days of another party's signature, this Consent Order becomes null and void.

54. DOE's, K-H's, SSOC's and RMRS's obligations under this Consent Order are limited to the matters expressly stated herein, any modification of this Consent Order, or any unilateral enforceable commitment dates established by the Department in accordance with paragraph 21 above.

55. Compliance with the Requirements of this Order (including any enforceable commitment dates that may be established under paragraph 21), together with the actions described in paragraphs 9 and 10, constitutes compliance with the requirement to obtain a permit under the CHWA for the solid and liquid mixed residues covered by this Order.

56. Upon the effective date of this Consent Order and during its term, the Department agrees this Consent Order shall operate in lieu of any administrative or civil action by the Department against DOE, K-H, SSOC and RMRS or their respective directors, officers, employees, agents or contractors with respect to the matters addressed herein.

57. The Department's approval of any document, standard or action under this Consent Order shall not constitute a defense to, nor an excuse for, any prior violation of any requirement of the Act or the Regulations not specifically addressed herein, or any subsequent violation of any requirements of this Consent Order, the Act or the Regulations, except as is otherwise agreed to by the Department.

58. Upon the effective date of this Consent Order, DOE, K-H, SSOC and RMRS release and covenant not to sue the State of Colorado as to all common law or statutory claims or

counterclaims arising from or relating to the violations of the Act or the Regulations specifically addressed herein.

59. DOE, K-H, SSOC and RMRS shall comply with applicable federal, state and/or local laws in conducting the activities required by this Consent Order. The Department makes no representation with respect to approvals and permits required by federal and local laws, and state law other than those required under the Act or the Regulations.

60. The parties may, by mutual consent, extend any time-frames specified in this Consent Order.

LIMITATION OF LIABILITY

61. The Department shall not be liable for any injuries or damages to persons or property resulting from acts or omissions of DOE, K-H, SSOC and/or RMRS, or those acting for or on behalf of those entities, including their officers, employees, agents, successors, representatives, contractors or consultants in carrying out activities pursuant to this Consent Order. The Department shall not be held out as a party to any contract entered into by DOE, K-H, SSOC and/or RMRS in carrying out activities pursuant to this Consent Order. Nothing in this Consent Order shall constitute an express or implied waiver of sovereign immunity otherwise applicable to the Department, its employees, agents or representatives.

NOTICES

62. Unless otherwise specified, any report or notice required under this Consent Order shall be delivered to the following:

For the Department:

Unit Leader
Hazardous Waste Compliance Unit
Compliance Program
Hazardous Materials and Waste Management Division
Colorado Department of Public Health and Environment
Cherry Creek Drive South, B-2
Denver, CO 80246-1530

For DOE

Facility Disposition
Rocky Flats Field Office
United States Department of Energy

RFETS, 10808 Highway 93, Unit A
Golden, CO 80403-8200

With a copy to:

Chief Counsel
Rocky Flats Field Office
United States Department of Energy
RFETS, 10808 Highway 93, Unit A
Golden, CO 80403-8200

For K-H

President
Kaiser-Hill Company, L.L.C.
RFETS, 10808 Highway 93, Unit B
Golden, CO 80403-8200

With a copy to:

Environmental Counsel
Office of General Counsel
Kaiser-Hill Company, L.L.C.
RFETS, 10808 Highway 93, Unit B
Golden, CO 80403-8200

For SSOC

President
Safe Sites of Colorado, L.L.C.
RFETS, 10808 Highway 93, Unit B
Golden, CO 80403-8200

With a copy to:

General Counsel
Safe Sites of Colorado, L.L.C.
RFETS, 10808 Highway 93, Unit B
Golden, CO 80403-8200

For RMRS

President
Rocky Mountain Remediation Services, L.L.C.

RFETS, 10808 Highway 93, Unit B
Golden, CO 80403-8200

With a copy to:

General Counsel
Rocky Mountain Remediation Services, L.L.C.
RFETS, 10808 Highway 93, Unit B
Golden, CO 80403-8200

MODIFICATIONS AND TERMINATION DATE

63. The parties may by mutual consent modify this Consent Order by written amendment duly signed and authorized by all parties. The parties agree to exercise good faith in considering modifications to this Consent Order that will significantly assist DOE, K-H, SSOC and RMRS in (a) selecting or implementing storage, treatment or disposal of waste; (b) protecting human health and the environment; or (c) developing a better, faster or more economical means to conduct the activities contemplated hereunder. In the event the parties do not agree upon the need for a modification, any party may refer the issue to dispute resolution in accordance with the above dispute resolution provisions.

64. K-H, SSOC and RMRS are hereby released from this Consent Order in the event K-H's contract with DOE is not renewed or extended. In such case, K-H's, SSOC's and RMRS's release shall be effective at midnight on the termination date of K-H's integrating management contract with DOE. Further, in the event DOE awards an integrating management or similar contract to another entity, the Department agrees to substitute that party and/or its subcontractors for K-H, SSOC and RMRS.

65. In the event K-H does not renew or extend SSOC's and RMRS's contracts beyond their current termination date, SSOC or RMRS, as is relevant, is hereby released from this Consent Order. In such case, SSOC's or RMRS's release shall be effective at midnight on the termination date of its subcontract with K-H. K-H shall require any entity replacing SSOC or RMRS as a subcontractor with its scope of work covering the matters addressed in this Consent Order to be party to this Consent Order. The Department agrees to substitute that entity for SSOC or RMRS, as is appropriate.

66. This Consent Order shall terminate as to (i) each tank identified in the MR Tank Plan, when a Closure Description Document or RFCA decision document covering that tank is approved by the Department; (ii) the draining of the tanks in Buildings 776/777 to a physically empty status, when those activities are completed; (iii) in Building 771, the removal of the actinide piping systems containing mixed residues, described in the IP for Board Recommendation 94-1, when those activities are completed; (iv) any material subsequently demonstrated not to be mixed waste, when the appropriate information is provided to and agreed upon by the Department's project manager; and (v) solid and

liquid mixed residues, when they are dispositioned in accordance with the IP for Board Recommendation 94-1.

67. For purposes of 42 U.S.C. section 6939c(b), this Consent Order shall terminate for any given mixed residues governed by this Consent Order and any TRM wastes generated from their processing when such mixed residues or TRM wastes are transferred to a program operating under a plan approved by the Department pursuant to 42 U.S.C. section 6939c(b)(1); when they are transferred to another DOE facility; or when the Department and DOE otherwise reach agreement about land disposal restrictions ("LDR") obligations for such residues or wastes.

RESERVATION OF RIGHTS

68. The Department reserves the right to bring any action or to seek civil or administrative penalties for any past, present or future violations of the Act or the Regulations for matters not specifically addressed herein. Further, the Department has the right to bring any action to enforce this Consent Order, and to seek penalties for any violation of this Consent Order.

69. Except as is expressly stated in this Consent Order, DOE, K-H, SSOC and RMRS reserve the rights and defenses each may have, whether procedural or substantive, in law or in equity, with respect to the Department and with respect to any person not a party to this Consent Order.

AUTHORIZATION TO SIGN

70. The undersigned represent and warrant that they are authorized to bind their respective principals to this Consent Order. This Consent Order may be executed in multiple counterparts, each of which shall be deemed an original, but all of which shall constitute one and the same Consent Order.

FOR THE UNITED STATES DEPARTMENT OF ENERGY:

Jessie Roberson

Jessie M. Roberson
Manager
Rocky Flats Field Office

10/27/99
Date

FOR KAISER-HILL COMPANY, L.L.C.:

Robert Tiller for
Robert G. Card
President

10/26/99
Date

FOR SAFE SITES OF COLORADO, L.L.C.:

Carl Cox
Carl Cox
President

10/7/99
Date

FOR ROCKY MOUNTAIN REMEDIATION SERVICES, L.L.C.:

Clegg Crawford
Clegg Crawford
President

10/6/99
Date

FOR THE COLORADO DEPARTMENT OF PUBLIC HEALTH AND ENVIRONMENT:

Howard Roitman
Howard A. Roitman
Director
Hazardous Materials and Waste Management Division

9-30-99
Date

APPROVED AS TO FORM:

9/24/09

Daniel S. Miller #14225*
First Assistant Attorney General
Natural Resources and Environment Section
Attorneys for the Department

1525 Sherman St., 5th Floor
Denver, Colorado 80203
Telephone: (303) 866-5110
*Counsel of Record

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Appendix A

Mixed Residue IDC List

IDC	DESCRIPTION	WASTE TYPE
0H61	DUCT HOLD UP MATERIAL	REM
0089	GREASE OXIDE (GREEN CAKE)	REM
0090	PLUTONIUM TETRAFLOURIDE (PUF4)	REM
0091	NON-SPEC FLUORIDE	REM
0092	IMPURE FLUORIDE HEEL	REM
0097	IMPURE FLUORIDE IN SMALL INNER CANS	REM
0099	GREASE FLUORIDE	REM
0290	FILTER SLUDGE	REM
0291	DRIED LAB WASTE FLUORIDE SLUDGE	REM
0292	INCINERATOR SLUDGE	REM
0299	MISCELLANEOUS INORGANIC SLUDGE	REM
0320	HEAVY NON-SS METAL (TA,W,PT)	REM
0321	LEAD	REM
0330	COMBUSTIBLES, DRY	REM
0331	FILTERS FULFLO, NOT FROM INCINERATOR	REM
0332	OILY SLUDGE	REM
0336	COMBUSTIBLES, WET	REM
0339	LEADED DRYBOX GLOVES,NOT ACID CONTAMINATED	REM
0340	SLUDGE FROM SIZE REDUCTION AREA	REM
0341	LEADED DRYBOX GLOVES, ACID CONTAMINATED	REM
0371	FIRE BRICK	REM
0372	GRIT	REM
0373	FIRE BRICK HEEL	REM
0377	FIRE BRICK, COARSE	REM
0378	FIRE BRICK, PULVERIZED OR FINES	REM
0419	UNPULVERIZED INCINERATOR ASH	REM
0420	PULVERIZED INCINERATOR ASH	REM
0421	ASH HEEL	REM
0422	SOOT	REM
0423	SOOT HEELS	REM
0428	ASH SELECTED FOR MMEC	REM
0438	INSULATION	REM
0444	GROUND/LEADED GLASS	REM

Rocky Flats Environmental Technology Site

Mixed Residue Tank Plan

September 24, 1999

Mixed Residue Tank Plan

1. Introduction

The Mixed Residue Tank Plan (Tank Plan) describes the management of mixed residue liquids at the Rocky Flats Environmental Technology Site (The Facility). This Plan has been prepared pursuant to The Compliance Order On Consent 99-09-24-01 (Consent Order) and replaces The Mixed Residue Tank Systems Management Plan dated 7-12-94. The parties to the consent order are the Colorado Department of Public Health and Environment (CDPHE), the United States Department of Energy (DOE), Kaiser-Hill Company, L.L.C. (Kaiser-Hill), Safe Sites of Colorado, L.L.C. (SSOC), and Rocky Mountain Remediation Services, L.L.C. (RMRS).

2. Objective

This Plan's objective is to identify activities for managing mixed residue liquids remaining in mixed residue tank systems until the tank system is managed pursuant to a CDPHE approved Closure Description Document (CDD) or a RFCA decision document (DD). This Plan also identifies enforceable commitment dates by which mixed residue tank systems will be physically empty. Physically empty is the condition of a tank or ancillary equipment in which no liquid remains after verification from personnel familiar with the tank system or a proven technology. For example, verification can be done by draining at low points or by non-destructive testing. The activities described herein are designed to protect human health and the environment, fulfill the Defense Board's Recommendation 94-1, and fulfill regulatory requirements.

3. Current Status

To date, all mixed residue tanks identified in Table 1 have been drained to an operationally empty status, and some are now being used to facilitate draining activities. The aqueous solutions have been processed in the Building 774 Bottle Box process (direct cementation), the Building 771 Hydroxide Precipitation process, the Building 371 Caustic Waste Treatment System (CWTS) (hydroxide precipitation with calcination), or the Building 374 Carrier Precipitation/Evaporation Process. Organic waste removed from the Building 707 C-Pit tank system is stored in four-liter bottles in permitted storage areas. Small amounts of actinide-bearing solutions remain as holdup in the bottoms of some tanks and ancillary equipment.

4. Purpose

The Plan's purpose is to describe the activities to manage the tank systems until the remaining solutions are removed, and the tanks are physically empty or closed. The activities are designed to protect human health and the environment. The parties acknowledge Raschig Rings cannot be removed from tanks without exposing workers to radiation. Therefore, to implement ALARA principles, Raschig Ring tanks will be considered physically empty so long as the residuals remaining after the liquids are drained present no significant risk to human health or the environment. Justification for the physically empty status will be submitted to CDPHE's Project Manager.

5. Assumptions

A number of assumptions have been made in formulating specific project plans and schedules for activities included in this Plan. If any of these assumptions are not met, certain projects and or tasks may be delayed or suspended pending resolution of the issue with CDPHE's project manager. DOE's or Kaiser-Hill's project manager will promptly notify CDPHE's project manager if any of the assumptions listed below are found to be invalid and result in impacts to the schedule which cannot be recovered by employing reasonable measures.

- No limitation in operations staff will occur. Sufficient numbers of personnel qualified in all crafts necessary to perform operations described in this Plan will be available through completion.

- Facilities and equipment necessary to support the removal and stabilization of liquid mixed residues will be available at a rate of 80%.

- No unanticipated breakage or accident to machinery, equipment or lines of pipe will occur.

- The facility's Authorization Basis covers all conditions encountered.

When a potential delay is identified, DOE's or Kaiser-Hill's project manager shall notify CDPHE's project manager in accordance with the terms of the Consent Order. The parties will mutually agree on the necessary action to be taken and, and if applicable, determine the schedule impacts. A Corrective Action Plan will then be developed in accordance with the Site's procedures to document and track completion of the corrective actions agreed to by the parties.

6. Management Strategy

Once drained, the Site's mixed residue tank systems will be closed in compliance with the Interim Status Closure Plan, which provides several options for closing hazardous waste management units. Specific activities to achieve closure will be described in an approved CDD or DD. Some tank systems or system components will be physically removed (ripped and stripped) during building disposition activities, which will include placing openings in pipes at low points and draining liquids (tap and drain) to eliminate the remaining solutions from tanks and associated piping. Once drained, the tank systems will be managed pursuant to the CDD or DD until closed, and will not be subject to the Consent Order.

Mixed residue tank systems may be closed using a phased approach. Phased closure begins when a tank system becomes physically empty and is completed when the system is closed pursuant to a CDD or a DD. A tank system may be closed immediately following its being physically empty status or closure may be scheduled pursuant to the RFCA budget planning process, and prioritized and integrated with other Site closure activities. Completion of specific closure activities will be documented in the Master List of RCRA Units, which will be maintained and updated in accordance with the RFETS Part B RCRA Operating Permit.

Mixed residue liquids generated from tap and drain activities will be treated in the Building 774 Bottle Box, the Building 371 CWTS, Building 374 Carrier Precipitation/ Evaporation process or other appropriate treatment process operating under the Facility's RCRA Part B permit.

Tank system components (pipes, valves, pumps, tanks, etc.) and secondary wastes (personnel protective equipment, wipes, tools, etc.) generated will be managed as remediation waste if the activities are governed by a DD.

7. Management Practices

7.1. Inspections.

Inspections will vary based upon the closure status and particular hazards associated with individual tank systems. Operationally empty tanks are typically inspected on a daily basis, and physically empty tanks are typically inspected quarterly. Other inspection frequencies may be determined appropriate on a case-by-case basis. Tanks will be inspected to verify the absence of a release and to ensure no new liquid or hazardous waste has been added to the tank system. For physically empty tanks, inspections will

also verify physical or administrative controls are in place. In the event additional inventory is discovered in a tank, the responsible building manager will be notified and an action plan will be developed to determine the source of the liquid, or schedule a sampling event or other appropriate action to make a hazardous waste determination. If appropriate, the action plan may include draining the liquid from the system. DOE's, Kaiser-Hill's, SSOC's or RMRS's project manager will notify CDPHE's project manager of intended corrective actions.

7.2. Release Response.

Building-specific Health & Safety Plans contain pre-planning requirements for responses to possible releases from mixed residue tank systems. Pre-planning activities include identification of vital components of the tank system, identification of locations of primary shut-off valves capable of isolating feed to a tank, and a pre-release plan which specifies the recommended method to drain the tank system (e.g., hot tapping at a low spot, draining into bottles, or draining into another tank system). Building operations personnel are trained to implement the pre-release plan and accompanying shut-off procedures. In the event of an actual release from a mixed residue tank system, the Site's RCRA Contingency Plan will be followed.

7.3. Storage Provisions.

During tap and drain and closure activities, solutions may be transferred from tank to tank, drained into four-liter bottles and stored in gloveboxes for short periods of time, or drained into a portable collection cart and staged in various locations, pending transfer to Building 371, Building 374, or Building 774 for processing or other appropriate unit for treatment. Prior to transfer or draining of liquids, a request for authorization to temporarily store mixed residue solutions will be submitted to CDPHE's project manager, if the information has not been previously provided in a CDD or DD. The request will identify the tanks, gloveboxes and portable cart staging locations needed to support liquid removal activities. During liquid transfer and draining activities, appropriate controls will be established to prevent the unauthorized mixing of incompatible wastes, including sampling, if necessary.

7.4. Reporting and Record Keeping.

Inspection log sheets are maintained in the Operating Records of the buildings containing the mixed residue tanks and ancillary equipment. Inspection frequencies for these tank systems will be documented in the Operating Record. Tank systems managed pursuant to a DD will be managed in accordance with the requirements of that document.

8. Schedule

The mixed residue tank systems listed in Table 1 will be physically emptied and/or closed in accordance with building deactivation and/or RFCA cleanup planning schedules. These planning schedules are not enforceable under this Consent Order. Tanks listed in Table 1 that are physically empty or closed will be documented as such in the Master List of RCRA Units. During annual updates to this Plan, physically empty or closed tanks will be removed from Table 1.

Enforceable Commitment Dates:

Building 771 - Mixed residue tank systems will be physically empty by December 31, 2001.

Building 776/777 – Mixed residue tank systems will be physically empty by December 31, 2002.

Table 1
Mixed Residue Tank Systems

Bldg.	Room	Tank	Tank Type	Contents
371	1107	D44A1	Pencil	HNO3/Pu
371	1107	D44A2	Pencil	HNO3/Pu
371	1107	D44A4	Pencil	HNO3/Pu
371	1107	D44A5	Pencil	HNO3/Pu
371	1107	D44A6	Pencil	HNO3/Pu
371	1107	D44B1	Pencil	HNO3/Pu
371	1107	D44B2	Pencil	HNO3/Pu
371	1107	D44B4	Pencil	HNO3/Pu
371	1107	D44B5	Pencil	HNO3/Pu
371	1107	D44B6	Pencil	HNO3/Pu
371	1109	D43A1	Pencil	HNO3/Pu
371	1109	D43A2	Pencil	HNO3/Pu
371	1109	D43A3	Pencil	HNO3/Pu
371	1109	D43A4	Pencil	HNO3/Pu
371	1109	D43A5	Pencil	HNO3/Pu
371	1109	D43B1	Pencil	HNO3/Pu
371	1109	D43B2	Pencil	HNO3/Pu
371	1109	D43B3	Pencil	HNO3/Pu
371	1109	D43B4	Pencil	HNO3/Pu
371	1109	D43B5	Pencil	HNO3/Pu
371	1115	D160A	Raschig Ring	KOH/Pu
371	1115	D160B	Raschig Ring	KOH/Pu
371	1115	D400A	Raschig Ring	Caustic/HNO3
371	1115	D400B	Raschig Ring	Caustic/HNO3
371	1115	D400C	Raschig Ring	Caustic/HNO3
371	1115	D179	Raschig Ring	HNO3/KOH/Pu
371	1117	D2A	Raschig Ring	Caustic Solution/Pu
371	1117	D2B	Raschig Ring	Caustic Solution/Pu
371	1117	D238A	Raschig Ring	KOH/Pu
371	1117	D238B	Raschig Ring	KOH/Pu
371	1117	D240A	Raschig Ring	KOH/Pu
371	1117	D240B	Raschig Ring	KOH/Pu
371	1117	D170	Pencil	HNO3/Pu
371	1117	D171	Pencil	HNO3/Pu
371	1117	D157A	Raschig Ring	KOH/Pu

Table 1
Mixed Residue Tank Systems

Bldg.	Room	Tank	Tank Type	Contents
371	1117	D157B	Raschig Ring	KOH/Pu
371	1127	D293A	Raschig Ring	HNO3/HCl/KOH/Pu
371	1127	D293B	Raschig Ring	HNO3/HCl/KOH/Pu
371	2223	D934A	Raschig Ring	HNO3/HCl/Pu
371	2223	D934B	Raschig Ring	HNO3/HCl/Pu
371	2317	D292A	Raschig Ring	HNO3/HCl/Pu
371	2317	D292B	Raschig Ring	HNO3/HCl/Pu
371	3517	D132A	Raschig Ring	HNO3/Pu
371	3517	D132B	Raschig Ring	HNO3/Pu
371	3517	D132C	Raschig Ring	HNO3/Pu
371	3549	D173A	Pencil	HNO3/Pu
371	3549	D173B	Pencil	HNO3/Pu
371	3549	D68A	Pencil	HNO3/KOH/Pu
371	3549	D68B	Pencil	HNO3/KOH/Pu
371	3549	T-6A	Pencil	HNO3/Pu
371	3549	T-6B	Pencil	HNO3/Pu
371	3549	T-6C	Pencil	HNO3/Pu
371	3549	T-6D	Pencil	HNO3/Pu
371	3549	T-7A	Pencil	HNO3/Pu
371	3549	T-7B	Pencil	HNO3/Pu
371	3549	T-7C	Pencil	HNO3/Pu
371	3549	T-7D	Pencil	HNO3/Pu
371	3549	T-9A	Pencil	HNO3/Pu
371	3549	T-9B	Pencil	HNO3/Pu
371	3553	D72A	Pencil	HNO3/Pu
371	3553	D72B	Pencil	HNO3/Pu
371	3553	D66A	Pencil	HNO3/KOH/Pu
371	3553	D66B	Pencil	HNO3/KOH/Pu
371	3553	T-4A	Pencil	HNO3/Pu
371	3553	T-4B	Pencil	HNO3/Pu
371	3553	T-4C	Pencil	HNO3/Pu
371	3553	T-5A	Pencil	HNO3/Pu
371	3553	T-5B	Pencil	HNO3/Pu
371	3553	T-5C	Pencil	HNO3/Pu
371	3553	T-28A	Pencil	HNO3/Pu

Table 1
Mixed Residue Tank Systems

Bldg.	Room	Tank	Tank Type	Contents
371	3553	T-28B	Pencil	HNO3/Pu
371	3553	T-28C	Pencil	HNO3/Pu
371	3559	D50A	Raschig Ring	HNO3/Pu
371	3559	D50B	Raschig Ring	HNO3/Pu
371	3559	D51A	Raschig Ring	HNO3/Pu
371	3559	D51B	Raschig Ring	HNO3/Pu
371	3559	D55A	Raschig Ring	HNO3/Pu
371	3559	D55B	Raschig Ring	HNO3/Pu
371	3559	D59	Raschig Ring	HNO3/Pu
371	3559	D69A	Raschig Ring	HNO3/Pu
371	3559	D69B	Raschig Ring	HNO3/Pu
371	3559	D69C	Raschig Ring	HNO3/Pu
371	3563	D49A	Raschig Ring	HNO3/Pu
371	3563	D49B	Raschig Ring	HNO3/Pu
371	3563	D49C	Raschig Ring	HNO3/Pu
371	3563	D49D	Raschig Ring	HNO3/Pu
371	3563	D52A	Raschig Ring	HNO3 Recycled Sol.
371	3563	D52B	Raschig Ring	Recycled Solution
371	3571	D150	Raschig Ring	HNO3/Pu
371	3571	D151	Raschig Ring	Acid Fumes
371	3571	D152A	Raschig Ring	HNO3/Pu
371	3571	D152B	Raschig Ring	HNO3/Pu
371	3571	D133	Raschig Ring	HNO3/Pu
371	3573	D134A	Raschig Ring	HNO3/Pu
371	3573	D134B	Raschig Ring	HNO3/Pu
371	3573	D134C	Raschig Ring	HNO3/Pu
371	3573	D135A	Raschig Ring	HNO3/Pu
371	3573	D135B	Raschig Ring	Acid Solution
371	3573	D289A	Raschig Ring	HNO3/Pu
371	3573	D289B	Raschig Ring	Acid Solvent
371	3573	D289C	Raschig Ring	Acid Solvent
771	114	D A - 509	Pencil	HNO3/Pu
771	114	D B - 510	Pencil	HNO3/Pu
771	114	D500	Pencil	HNO3/Pu
771	114	D501	Pencil	HNO3/Pu

Table 1
Mixed Residue Tank Systems

Bldg.	Room	Tank	Tank Type	Contents
771	114	D502	Pencil	HNO3/Pu
771	114	D503	Pencil	HNO3/Pu
771	114	D504	Pencil	HNO3/Pu
771	114	D505	Pencil	HNO3/Pu
771	114	D506	Pencil	HNO3/Pu
771	114	D507	Pencil	HNO3/Pu
771	114	D508	Pencil	HNO3/Pu
771	114	D529	Pencil	HNO3/Pu
771	114	D530	Pencil	HNO3/Pu
771	114	D544	Annular	HNO3/Pu
771	114	D545	Annular	HNO3/Pu
771	114	D546	Annular	HNO3/Pu
771	114	D547	Annular	HNO3/Pu
771	114	D548	Annular	HNO3/Pu
771	114	D549	Annular	HNO3/Pu
771	114	D550	Annular	HNO3/Pu
771	114	D551	Annular	HNO3/Pu
771	114	D552	Annular	HNO3/Pu
771	114	D553	Annular	HNO3/Pu
771	114	D554	Annular	HNO3/Pu
771	114	D609	Pencil	Nitric/Sulfuric
771	114	D610	Pencil	Nitric/Sulfuric
771	114	D705	Raschig Ring	Spent Caustic
771	114	D706	Raschig Ring	Spent Caustic
771	114	D713	Raschig Ring	Spent Caustic
771	114	D714	Raschig Ring	Spent Caustic
771	114	D715	Raschig Ring	Acid/Americium
771	114	D716	Raschig Ring	Acid/Americium
771	114	D764	Raschig Ring	Acid/Americium
771	114	D765	Raschig Ring	Acid/Americium
771	114	D949	Annular	HNO3/Pu
771	114	D950	Annular	HNO3/Pu
771	114	D951	Annular	HNO3/Pu
771	114	D952	Annular	HNO3/Pu
771	114	D953	Annular	HNO3/Pu

Table 1
Mixed Residue Tank Systems

Bldg.	Room	Tank	Tank Type	Contents
771	114	D954	Annular	HNO3/Pu
771	114	D955	Annular	HNO3/Pu
771	146	D1001	Pencil	Pu/U/HNO3
771	146	D1002	Pencil	Pu/U/HNO3
771	146	D1003	Pencil	Pu/U/HNO3
771	146	D1004	Pencil	Pu/U/HNO3
771	146	D1005	Pencil	Pu/U/HNO3
771	146	D1006	Pencil	Pu/U/HNO3
771	146	D1007	Raschig Ring	Pu/U/HNO3
771	146	D1008	Raschig Ring	Pu/U/HNO3
771	146	D1009	Pencil	Pu/U/HNO3
771	146	D1010	Pencil	Pu/U/HNO3
771	146	D1011	Pencil	Pu/U/HNO3
771	146	D1012	Pencil	Pu/U/HNO3
771	146	D1013	Raschig Ring	Pu/U/HNO3
771	146	D1014	Raschig Ring	Pu/U/HNO3
771	146	D1019	Pencil	Neptunium Solution
771	146	D1020	Pencil	Neptunium Solution
771	146	D1022	Raschig Ring	Pu/U/HNO3
771	146	D1023	Raschig Ring	Pu/U/HNO3
771	146	D1024	Raschig Ring	HNO3/Pu
771	146	D1032	Pencil	Pu/U/HNO3
771	146	D1062	Pencil	U/HNO3
771	146	D1063	Pencil	U/HNO3
771	146	D1064	Pencil	Pu/U/HNO3
771	146	D1065	Pencil	Pu/U/HNO3
771	146	D1066	Pencil	Pu/U/HNO3
771	149	D177	Raschig Ring	KOH
771	149	D203	Raschig Ring	Pu Chloride/Nitrate
771	149	D204	Raschig Ring	Pu Chloride/Nitrate
771	149	D205	Raschig Ring	Pu Chloride/Nitrate
771	149	D206	Raschig Ring	Pu Chloride/Nitrate
771	149	D207	Raschig Ring	Pu Chloride/Nitrate
771	149	D208	Raschig Ring	Pu Chloride
771	149	D218	Raschig Ring	Pu Chloride/Nitrate

Table 1
Mixed Residue Tank Systems

Bldg.	Room	Tank	Tank Type	Contents
771	149	D219	Raschig Ring	Pu Chloride/Nitrate
771	149	D360	Raschig Ring	Pu Chloride
771	149	D361	Raschig Ring	Pu Chloride
771	149	D362	Raschig Ring	Pu Chloride
771	149	D363	Raschig Ring	Pu Chloride
771	149	D364	Annular	HNO3/Pu
771	149	D451	Raschig Ring	HNO3/Pu
771	149	D452	Raschig Ring	HNO3/Pu
771	149	D453	Raschig Ring	HNO3/Pu
771	149	D454	Raschig Ring	HNO3/Pu
771	149	D466	Raschig Ring	HNO3/Pu
771	149	D467	Raschig Ring	HNO3/Pu
771	149	D468	Raschig Ring	HNO3/Pu
771	149	D469	Raschig Ring	HNO3/Pu
771	149	D470	Raschig Ring	HNO3/Pu
771	149	D472	Raschig Ring	HNO3/Pu
771	149	D630	Pencil	KOH
771	149	D631	Pencil	KOH
771	149	D921	Raschig Ring	Spent Caustic
771	149	D922	Raschig Ring	Spent Caustic
771	149	D923	Raschig Ring	H2O/Spent Caustic
771	149	D927	Raschig Ring	H2O/Spent Caustic
771	149	D928	Pencil	Spent Caustic
771	149	D931	Annular	HNO3/Pu
771	149	D932	Annular	HNO3/Pu
771	149	D933	Annular	HNO3/Pu
771	149	D934	Annular	HNO3/Pu
771	149	D971	Raschig Ring	HNO3/Pu
771	149	D972	Raschig Ring	HNO3/Pu
771	149	D973	Raschig Ring	HNO3/Pu
771	149	D974	Raschig Ring	HNO3/Pu
771	149	D975	Raschig Ring	HNO3/Pu
771	149	D976	Raschig Ring	HNO3/Pu
771	149	D980	Raschig Ring	Spent Acid
771	153	D3	Pencil	Caustic

Table 1
Mixed Residue Tank Systems

Bldg.	Room	Tank	Tank Type	Contents
771	153	D4	Pencil	Caustic
771	153	D86	Raschig Ring	Spent Caustic
771	153	D87	Raschig Ring	Caustic
771	153	D88	Raschig Ring	Caustic
771	174	D1081	Raschig Ring	Pu/U/HNO3
771	174	D1082	Raschig Ring	Pu/U/HNO3
771	174	D1083	Raschig Ring	Pu/U/HNO3
771	174	D1084	Raschig Ring	Process Water
771	174	D1087	Pencil	Pu/U/HNO3
771	174	D1088	Pencil	Pu/U/HNO3
771	180A	D1803	Pencil	HNO3/Pu
771	180A	D1804	Pencil	HNO3/Pu
771	180A	D1805	Pencil	HNO3/Pu
771	180A	D1809	Annular	Distillate
771	180A	D1810	Annular	HNO3/Pu
771	180A	D1811	Annular	HNO3/Pu
771	180A	D1813	Pencil	HNO3/Pu
771	180A	D1816	Pencil	Distillate
771	180A	D1817	Pencil	Distillate
771	180A	D1818	Pencil	Distillate
771	180A	D1819	Pencil	Distillate
771	180K	D80	Raschig Ring	Distillate
771	180K	D81	Raschig Ring	Distillate
771	180K	D82	Raschig Ring	Distillate
771	180K	D83	Raschig Ring	HNO3/Pu
771	180K	D84	Raschig Ring	HNO3/Pu
771	180K	D85	Raschig Ring	HNO3/Pu
771	181A	D1401	Annular	Uranyl Nitrate
771	181A	D1402	Annular	Uranyl Nitrate
771	181A	D1406	Pencil	Strip Solution
771	181A	D1407	Pencil	Strip Solution
771	181A	D1409	Pencil	Uranium Sulfate
771	181A	D1410	Pencil	Ammonium Sulfate
771	181A	D1411	Pencil	Ammonium Sulfate
776	134	SR3	Raschig Ring	SRV Waste

Table 1
Mixed Residue Tank Systems

Bldg.	Room	Tank	Tank Type	Contents
776	134	SR4	Raschig Ring	SRV Waste
776	134	SR5	Raschig Ring	SRV Waste
776	134	T344	Pencil	ASRF Steam Waste
776	134	T345	Pencil	ASRF Steam Waste
776	134	T360	Annular	ASRF Steam Waste
776	134	T370	Annular	ASRF Steam Waste
776	146	Annular Tank	Annular	Ball Mill Wastewater
776	146	Collection Pan	Pan	Ball Mill Wastewater
776	146	Ball Mill Washer	Pan	Ball Mill Wastewater
777	131	DL776	Raschig Ring	Oil/CCl4/Pu
777	131	V-605	Raschig Ring	Oil/CCl4/Pu
777	131	V-614	Raschig Ring	Oil/CCl4/Pu
777	131	V-616	Raschig Ring	Oil/CCl4/Pu
777	131	V-618	Raschig Ring	Oil/CCl4/Pu
777	131	V-620	Raschig Ring	Oil/CCl4/Pu
777	131	V-626	Raschig Ring	Oil/CCl4/Pu
777	131	V-627	Raschig Ring	Oil/CCl4/Pu
777	430	T1	Raschig Ring	TCA/Pu
777	430	T2	Raschig Ring	TCA/Pu
777	452	V-022	Raschig Ring	Oil/CCl4/Pu
777	452	V-543	Pencil	Oil/CCl4/Pu
777	134A	V-746	Raschig Ring	Oil/CCl4/Pu
777	134A	V-747	Raschig Ring	Oil/CCl4/Pu
777	134A	V-748	Raschig Ring	Oil/CCl4/Pu
777	134A	V-749	Raschig Ring	Oil/CCl4/Pu
777	134A	V-752	Raschig Ring	Oil/CCl4/Pu

Department of Energy

ROCKY FLATS FIELD OFFICE
10808 HIGHWAY 93, UNIT A
GOLDEN, COLORADO 80403-8200

April 10, 2001

OCC-01-0404

Howard A. Roitman, Director
Hazardous Materials and Waste Management Division
Colorado Department of Public Health and Environment
4300 Cherry Creek Drive South
Denver, CO 80246-1530

Dear Mr. Roitman:

This is to transmit the enclosed executed First Amendment to Compliance Order on Consent Number 99-09-24-1, which removes Safe Sites of Colorado, L.L.C. and Rocky Mountain Remediation Services, L.L.C. as parties from the Order.

If you have any questions regarding this transmittal, please call Rick DiSalvo, Rocky Flats Field Office, Office of Chief Counsel at 303-966-4765.

Thank you for you assistance in this matter.

Sincerely,

Barbarba A. Mazurowski
Manager

Enclosure

cc w/Enc.
D. Miller, COAG
J. Legare, AME&I, RFFO
R. DiSalvo, OCC, RFFO
C. Deck, K-H Legal
R. McPherson, RMRS
D. Raag, SSOC

BEFORE THE HAZARDOUS MATERIALS AND WASTE MANAGEMENT DIVISION
COLORADO DEPARTMENT OF PUBLIC HEALTH AND ENVIRONMENT
STATE OF COLORADO

FIRST AMENDMENT TO COMPLIANCE ORDER ON CONSENT Number 99-09-24-1

IN THE MATTER OF ROCKY FLATS ENVIRONMENTAL TECHNOLOGY SITE

This Amendment to Compliance Order on Consent ("Consent Order") Number 99-09-24-1 is issued and entered into by and among the Colorado Department of Public Health and Environment, Hazardous Materials and Waste Management Division (the "Department") pursuant to the Department's authority under §25-15-308(2), C.R.S. of the Colorado Hazardous Waste Act, §25-15-301, et seq., and the Colorado Hazardous Waste Regulations, 6 CCR 1007-3; the United States Department of Energy ("DOE"); Kaiser-Hill Company, L.L.C. ("K-H"); Safe Sites of Colorado, L.L.C. ("SSOC"); and Rocky Mountain Remediation Services, L.L.C. ("RMRS"). Consent Order Number 99-09-24-1 arises out of activities conducted at the Rocky Flats Environmental Technology Site in Golden, Colorado (the "RFETS" or the "Facility").

PURPOSE OF AMENDMENT

1. The purpose of this amendment is to remove RMRS and SSOC from the Mixed Residue Consent Order, Number 99-09-24-1. The removal of RMRS and SSOC from Consent Order Number 99-09-24-1 is consistent with K-H becoming the sole operating contractor at RFETS, effective February 1, 2000. DOE remains the owner and co-operator of RFETS. RMRS and SSOC were removed from the RFETS RCRA permit on November 3, 2000.
2. All references to Rocky Mountain Remediation Services, LLC, RMRS, Safe Sites of Colorado, LLC, and SSOC are deleted from the introduction and from paragraphs 12, 13, 17, 18, 20, 23, 32, 33, 35, 38, 39, 43, 44, 46, 48, 49, 50, 54, 56, 58, 59, 61, 62, 63, 64, and 69 of the Consent Order. Paragraph 65 is deleted in its entirety.
3. All other terms and conditions of Consent Order Number 99-09-24-1 remain unchanged.

AUTHORIZATION TO SIGN

The undersigned represent and warrant that they are authorized to bind their respective principals to this amendment to Consent Order Number 99-09-24-1. This amendment may be executed in multiple counterparts, each of which shall be deemed an original, but all of which shall constitute one and the same Consent Order.

FOR THE UNITED STATES DEPARTMENT OF ENERGY:

Barbara A. Mazurowski
Barbara Mazurowski
Manager
Rocky Flats Field Office

4-10-01
Date

FOR KAISER-HILL COMPANY, L.L.C.:

Robert Tiller
~~Robert G. Card~~ ACTG. PRES.
President and CEO

3/23/01
Date

FOR SAFE SITES OF COLORADO, L.L.C.:

Richard D. Raaz
Richard D. Raaz
President

3/23/01
Date

FOR ROCKY MOUNTAIN REMEDIATION SERVICES, L.L.C.:

Thomas F. Burns, Jr.
Thomas F. Burns, Jr.
President

3.23.01
Date

FOR THE COLORADO DEPARTMENT OF PUBLIC HEALTH AND ENVIRONMENT:

Howard Roitman 3-13-01

Howard A. Roitman
Director
Hazardous Materials and Waste Management Division

Date

APPROVED AS TO FORM:

3/8/01

Daniel S. Miller #14225*
First Assistant Attorney General
Natural Resources and Environment Section
Attorneys for the Department

1525 Sherman St., 5th Floor
Denver, Colorado 80203
Telephone: (303) 866-5110
*Counsel of Record