#### PERMITTEE:

Department of the Air Force

Base Commander

Eglin Air Force Base Florida 32542-5133

I.D. Number: FL 8570024366

Permit/Cert. Number: HO46-286388

Date of Issue:

Expiration Date: September 1, 2001

County: Okaloosa

Latitude/Longitude: 30°28'34"N/86°29'54"W

Section/Township/Range: 34/1N/22W
Project: Storage and Thermal Treatment

of Hazardous Waste

This Permit is issued under the provisions of Chapter 403-722, Florida Statutes, and Florida Administrative Code Rule(s) 62-4, 62-530, 62-550 and 62-730. The above named permittee is hereby authorized to perform the work or operate the facility shown on the application and approved drawing(s), plans, and other documents attached hereto or on file with the Department and made a part hereof and specifically described as follows:

1. To operate a hazardous waste container storage facility in accordance with the storage plan presented in Figure D-1 of the permit application. The maximum amount of material which may be stored in the facility is 24,000 gallons.

Storage capacity is limited to the following:

Bay 1	Flammables, Flammable Toxics and Combustible	es 15,700 gallons
Bay 2	Receiving	2,200 gallons
Bay 3	Oxidizers, Acids, Reactives, Toxics	6,100 gallons
		24,000 gallons

2. To open burn and open detonate waste explosives on Range 62 and open detonate waste explosives on Range 52 North.

The open burn unit consists of two steel burn kettles 20 feet long, 8 feet wide and 8 feet high. Sides and bottom are constructed of 1/2 inch steel plate continuously welded on the interior with a reinforced 4 inch by 3 inch by 1/4 inch rectangular tubing top rail. Side walls and bottom are reinforced with 4 inch by 5.4 pounds per foot structural channel on 30 inch centers. One end of each burn kettle has doors that are 1/2 inch plate with a 4 inch by 5.4 pounds per foot structural channel reinforcement. A 6 inch steel dam is welded at the door opening to the burn kettle where wastes are placed to provide additional containment of virgin fuel used to initiate burning. Each burn kettle is

underlain with 2 feet of compacted soil and a 6 millimeter Kevlar reinforced polyethylene liner.

Open Detonation (OD) operations occur at locations on Range 52 North and Range 62 directly on the ground surface. Craters formed by previous OD operations are used for OD events. Soon after the OD unit can be safely approached following completion of a detonation (generally within one hour of the detonation), the OD unit is inspected for any items which remain after detonation. Negligible quantities of ash are generated from the OD operations. Items still containing energetic material are detonated immediately. Large metallic items not containing energetic materials are transported to the Defense Reutilization and Marketing Office for recycle/resale.

Operation of the facility will be in accordance with the revised permit application dated November 7, 1985, the additional information submitted on February 26, 1986, the information submitted on August 24, 1990, the renewal application submitted on July 22, 1991, the application submitted on May 10, 1995, the information discussed on August 30, 1995, (minutes dated September 11), the information received on November 2, 1995, the renewal application dated March 21, 1996, and the Quality Assurance/Project Assurance Plan received on May 3, 1996.

#### GENERAL CONDITIONS

- 1. The terms, conditions, requirements, limitations, and restrictions set forth herein are "Permit Conditions" and as such are binding upon the permittee and enforceable pursuant to the authority of Sections 403.161, 403.727, or 403.859 through 403.861, Florida Statutes. The permittee is hereby placed on notice that the Department will review this Permit periodically and may initiate enforcement action for any violation of the "Permit Conditions" by the permittee, its agents, employees, servants, or representatives.
- 2. This Permit is valid only for the specific processes and operations applied for and indicated in the approved drawings or exhibits. Any unauthorized deviation from the approved drawings, exhibits, specifications, or conditions of this Permit may constitute grounds for revocation and enforcement action by the Department.
- 3. As provided in Subsections 403.087(6) and 403.722(5), Florida Statutes, the issuance of this Permit does not convey any vested rights or any exclusive privileges. Nor does it authorize any injury to public or private property or any invasion of personal rights, nor any infringement of federal, state or local laws or regulations. This Permit does not constitute a waiver of or approval of any other Department permit that may be required for other aspects of the total project which are not addressed in the Permit.
- 4. This Permit conveys no title to land or water, does not constitute state recognition or acknowledgment of title, and does not constitute authority for the use of submerged lands unless herein provided and the necessary title or leasehold interests have been obtained from the State. Only the Trustees of the Internal Improvement Trust Fund may express State opinion as to title.

- 5. This Permit does not relieve the permittee from liability for harm or injury to human health or welfare, animal, plant or aquatic life or property and penalties therefore caused by the construction or operation of this Permitted source, nor does it allow the permittee to cause pollution in contravention of Florida Statutes and Department rules, unless specifically authorized by an order from the Department.
- 6. The permittee shall at all times properly operate and maintain the facility and systems of treatment and control (and related appurtenances) that are installed or used by the permittee to achieve compliance with the conditions of this Permit, as required by Department rules. This provision includes the operation of backup or auxiliary facilities or similar systems when necessary to achieve compliance with the conditions of the Permit and when required by Department rules.
- 7. The permittee, by accepting this Permit, specifically agrees to allow authorized Department personnel, upon presentation of credentials or other documents as may be required by law, access to the premises, at reasonable times, where the permitted activity is located or conducted for the purpose of:
  - a. Having access to and copying any records that must be kept under the conditions of the Permit;
  - b. Inspecting the facility, equipment, practices, or operations regulated or required under this Permit; and
  - c. Sampling or monitoring any substances or parameters at any location reasonably necessary to assure compliance with this Permit or Department rules.

Reasonable time may depend on the nature of the concern being investigated.

- 8. If, for any reason, the permittee does not comply with, or will be unable to comply with, any condition or limitation specified in this Permit, the permittee shall immediately notify and provide the Department with the following information:
  - a. A description of and cause of non-compliance; and
  - b. the period of non-compliance, including exact dates and times; or, if not corrected, the anticipated time the non-compliance is expected to continue, and steps being taken to reduce, eliminate, and prevent recurrence of the non-compliance.

The permittee shall be responsible for any and all damages which may result and may be subject to enforcement action by the Department for penalties or revocation of this Permit.

9. In accepting this Permit, the permittee understands and agrees that all records, notes, monitoring data and other information relating to the construction or operation of this permitted source, which are submitted to the Department, may be used by the Department as evidence in any enforcement case involving the permitted source arising under the Florida Statutes or Department rules, except

where such use is proscribed by Sections 403.73 and 403.111, Florida Statutes. Such evidence shall only be used to the extent it is consistent with the Florida Rules of Civil Procedure and appropriate evidentiary rules.

- 10. The permittee agrees to comply with changes in Department rules and Florida Statutes after a reasonable time for compliance, provided however, the permittee does not waive any other rights granted by Florida Statutes or Department rules. A reasonable time for compliance with a new or amended surface water quality standard, other than those standards addressed in Rule 62-302.500, F.A.C., shall include a reasonable time to obtain or be denied a mixing zone for the new or amended standard.
- 11. This Permit is transferable only upon Department approval in accordance with Florida Administrative Code Rules 62-4.120 and 62-730.300, as applicable. The permittee shall be liable for any noncompliance of the permitted activity until the transfer is approved by the Department.
- 12. This Permit is required to be kept at the work site of the permitted activity during the entire period of construction, operation, or closure.
- 13. This Permit also constitutes:
  - ( ) Determination of Best Available Control Technology (BACT)
  - ( ) Determination of Prevention of Significant Deterioration (PSD)
  - ( ) Certification of Compliance with State Water Quality Standards (Section 401, PQL 92-500)
  - ( ) Compliance with New Source Performance Standards
- 14. The permittee shall comply with the following monitoring and record keeping requirements:
  - a. Upon request, the permittee shall furnish all records and plans required under Department rules. The retention period for all records will be extended automatically, unless otherwise stipulated by the Department, during the course of any unresolved enforcement action.
  - b. The permittee shall retain at the facility or other location designated by this Permit records of all monitoring information (including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation), copies of all reports required by this Permit, and records of all data used to complete the application for this Permit. The time period of retention shall be at least three years from the date of the sample, measurement, report or application unless otherwise specified by Department rule.
  - c. Records of monitoring information shall include:
    - the date, exact place, and time of sampling or measurements;
    - the person responsible for performing the sampling or measurements;
    - the date(s) analyses were performed;
    - the person responsible for performing the analyses;

- the analytical techniques or methods used; and
- the results of such analyses.
- 15. When requested by the Department, the permittee shall, within a reasonable period of time furnish any information required by law which is needed to determine compliance with the Permit. If the permittee becomes aware that relevant facts were not submitted or were incorrect in the permit application or in any report to the Department, such facts or information shall be submitted or corrected promptly.
- 16. In the case of a hazardous waste facility Permit, the following Permit conditions shall also apply.
  - a. The permittee will submit the following reports to the Department:
    - (1) Manifest discrepancy report: If a significant discrepancy in a manifest is discovered, the permittee must attempt to reconcile the discrepancy. If not resolved within 15 days after receiving the waste, the permittee shall immediately submit a letter report, including a copy of the manifest, to the Department.
    - (2) Unmanifested waste report: Permittee shall submit an unmanifested waste report to the Department within 15 days of receipt of unmanifested waste.
    - (3) Biennial report: A biennial report covering facility activities during the previous calendar year must be submitted to the Department by March 1 of each even numbered year in accordance with Florida Administrative Code Chapter Rule 62-730.
  - b. Notification of any non-compliance which may endanger health or the environment, including the release of any hazardous waste that may endanger public drinking water supplies, or the occurrence of a fire or explosion from the facility which could threaten the environment or human health outside the facility, shall be verbally submitted to the Department within 24 hours and a written submission provided within 5 days. The verbal submission within 24 hours shall contain the name, address, I.D. number and telephone number of the facility and owner or operator, the name and quantity of materials involved, the extent of injuries (if any), an assessment of actual or potential hazards, and the estimated quantity and disposition of recovered material. The written submission shall contain the following:
    - (1) A description of and cause of non-compliance; and
    - (2) If not corrected, the anticipated time the noncompliance is expected to continue and steps being taken to reduce, eliminate, and prevent recurrence of the noncompliance.
  - c. Reports of compliance or non-compliance with, or any progress reports on requirements contained in any compliance schedule of this Permit shall be submitted no later than 14 days following each schedule date.

d. All reports or information required to be submitted to the Department by a hazardous waste permittee shall be signed by a person authorized to sign a permit application.

#### SPECIFIC CONDITIONS

# Part I - General Operating Requirements Storage Facility

- 1. The permittee shall notify the Department in writing four weeks prior to receipt of hazardous waste from a foreign source. 40 CFR 264.12
- 2. The permit allows the permittee to store only those wastes specified in Section C of the application at the facility. Prior to acceptance of new hazardous wastes, the permittee shall submit to the Department, for approval, a waste analysis of the proposed new waste stream. This analysis must also be incorporated in the general waste analysis plan and retained on-site. 40 CFR 264.13.
- 3. The permittee shall inspect the facility operating, emergency, and safety equipment in accordance with the schedule approved in Section #C1, Table II.3 and Section F of the permit application. The permittee shall remedy any deterioration or malfunction discovered by an inspection, in accordance with the requirements of 40 CFR 264.15(c). Changes, additions, or deletions to the schedule must be approved in writing by the Department. The schedule must be maintained as part of the operating record of the facility (40 CFR 264.15).
- 4. Facility personnel must successfully complete the approved training program indicated in Sections H and II.E of the permit application within six months of employment or assignment to a facility or to a new position at the facility. Verification of this training must be kept with the personnel training records and maintained on site. Personnel shall not work unsupervised until training has been completed. The training must be reviewed by facility personnel at least once annually. Facility shall maintain an updated list of personnel handling hazardous waste and their respective job titles at the site.
- 5. The permittee shall comply with the following conditions concerning the contingency plan:
- a. The permittee shall immediately carry out the provisions of the contingency plan, Section II.D of the permit application, and follow the emergency procedures described by 40 CFR 264.56, whenever there is a an unplanned fire, explosion, or release of hazardous waste or hazardous waste constituents which threaten human health or the environment. The permittee shall give proper notification if an emergency situation arises and within 15 days must submit to the Department a written report which includes all information required in 40 CFR 264.56(j).
  - b. The permittee shall comply with the requirements of 40 CFR 264.53.
- c. Within seven days of meeting any criteria listed in 40 CFR 264.54(a), (b), or (c), the permittee shall amend the plan and submit the amended plan for Department approval. Any other changes to the plan must be submitted to the

Department within seven days of the change. All amended plans must be distributed to the appropriate agencies.

- d. The permittee shall comply with requirements of 40 CFR 264.55, concerning the emergency coordinator.
- e. The Department of Environmental Protection's 24 hour emergency telephone number is (904) 413-9911. During normal business hours, the Department's Northwest District Office may be contacted at (904) 444-8360.
- 6. The permittee shall maintain a written operating record at the facility which includes:
- a. The description and quantity of each hazardous waste received and the method(s) and date(s) of its treatment, storage or disposal at the burn unit, as specified in 40 CFR 264.73(b)(1).
- b. The location of each hazardous waste within the facility, and the quantity at burn unit;
  - c. The results of waste analyses;
- d. A summary report and details of incidents that require implementation of the contingency plan;
  - e. Manifest numbers;
- f. Land Disposal Restriction documents as specified in 40 CFR 264.73(b)(12);
  - g. The results of inspections (for 3 years);
  - h. Annual certification of waste minimization;
  - i. The closure plan and cost estimates;
  - j. Biennial reports; and
  - k. Air, soil and groundwater monitoring data.

These records must be maintained at the facility until completion of closure and the certification of closure is accepted by the Department (40 CFR 264.73).

- 7. The permittee shall comply with the following conditions concerning preparedness and prevention:
- a. At a minimum, the permittee shall equip the facility with the equipment described in the contingency plan, Section II.C, Tables II.6 through II-8 of the permit application, as required by 40 CFR 264.32.
- b. The permittee shall test and maintain the equipment specified in Specific Condition 8(a), of this part, as necessary to assure its proper operation in time of emergency, as required by  $40\ \text{CFR}\ 264.33$ .

- c. The permittee shall maintain access to the communications or alarm system, as required by  $40\ \text{CFR}\ 264.34$ .
- d. The permittee shall maintain arrangements with state and local authorities as required by 40 CFR 264.37. If state or local officials refuse to enter into preparedness and prevention arrangements with the permittee, the permittee must document this refusal in the operating record.
- 8. Storage containers must conform to DOT specifications and Section D and Appendix D-1 of the application, and be managed in accordance with the approved operational plan. Containers shall be kept closed except when adding waste and be handled in a manner that will not allow the containers to rupture or leak. If a container holding hazardous waste is not in good condition, or begins to leak, the waste shall be transferred to another container in good condition. 40 CFR 264.171, 40 CFR 264.173
- 9. The permittee shall not store ignitable or reactive wastes within 15 meters of the property line. 40 CFR 264.176
- 10. The permittee shall inspect the container storage area in accordance with the schedule and procedures approved in Section F of the application.  $40~\mathrm{CFR}$  264.174
- 11. Spilled or leaked waste and accumulated precipitation must be removed from the collection area, analyzed and disposed of in accordance with Section G of the permit application. 40 CFR 264.175
- 12. Waste shall not be stored in containers or placed in unwashed containers that have previously held an incompatible waste. 40 CFR 264.177

# PART II - General Operating Requirements Thermal Treatment

- 1. The permittee shall maintain the facility to minimize the possibility of fire, explosion, or any unplanned sudden or non sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water which could threaten human health or the environment, in accordance with 40 CFR 264.31 and 40 CFR 264.601.
- 2. The permittee shall follow the procedures described in the waste analysis plan, Section II.B.2 of the permit application (40 CFR 264.13(b)).
- 3. The permittee shall comply with the security provisions of 40 CFR 264.14(b)(2) and (c).
- 4. The permittee shall comply with the general requirements of 40 CFR 264.17(a) and (b), and the location requirements of 40 CFR 264.176.
- 5. The permittee shall comply with the manifest requirements of 40 CFR 264.71, 264.72, and 264.76.

# PART III - Waste Minimization

- 1. In the event that the permittee treats, stores, or disposes of hazardous wastes on-site where such wastes were generated, then the permittee must comply with 40 CFR part 264.73(b)(9), and the permittee must certify, no less often than annually, that:
- a. The permittee has a program in place to reduce the volume and toxicity of hazardous waste generated to the degree determined by the permittee to be economically practicable;
- b. The proposed method of treatment, storage or disposal is the most practicable method available to the permittee which minimizes the present and future threat to human health and the environment; and,
- c. The permittee shall maintain copies of certification in the facility operating record as required by 40 CFR 264.73(b)(9).
- 2. If the waste minimization program, as detailed in Specific Condition 1 of this part, is applicable, then the permittee shall, at a minimum, address the following elements:
  - a. Top management support
- 1. A dated and signed policy describing management support for waste minimization and for implementation of a waste minimization plan,
- 2. A description of employee awareness and training programs designed to involve employees in waste minimization planning and implementation to maximize the extent feasible, and
- 3. A description of how a waste minimization plan has been incorporated into management practices so as to ensure ongoing efforts with respect to product design, capital planning, production operations, and maintenance;
  - b. Characterization of waste generation
- 1. Identification of types, amounts, and hazardous constituents of waste streams, with the source and date of generation;
  - c. Periodic waste minimization assessments
- 1. Identification of all points in a process where materials can be prevented from becoming a waste, or can be recycled,
- Identification of potential waste reduction and recycling techniques applicable to each waste, with a cost estimate for capital investment and implementation,
- Description of technically and economically practical waste reduction/recycling options to be implemented, and a planned schedule for implementation,

4. Specific performance goals, preferably quantitative, for the source reduction of waste by stream. Whenever possible, goals should be stated as weight of waste generated per standard unit of production, as defined by the generator.

#### d. Cost allocation system

- 1. Identification of waste management costs for each waste, factoring in liability, transportation, recordkeeping, personnel, pollution control, treatment, disposal, compliance, and oversight costs to the extent feasible,
- 2. Description of how departments are held accountable for the wastes they generate,
- 3. Comparison of waste management costs with costs of potential reduction and recycling techniques applicable to each waste;

# e. Technology transfer

1. Description of efforts to seek and exchange technical information on waste minimization from other parts of the company, other firms, trade associations, technical assistance programs, and professional consultants;

# f. Program evaluation

- 1. Description of types and amounts of hazardous waste reduced or recycled,
- 2. Analysis and quantification of progress made relative to each performance goal established and each reduction technique to be implemented,
  - 3. Amendments to waste minimization plan and explanation,
- 4. Explanation and documentation of reduction efforts completed or in progress before development of the waste minimization plan, and
- 5. Explanation and documentation regarding impediments to hazardous waste reduction specific to the individual facility.

# Part IV - Thermal Treatment Unit

- 1. The permittee is allowed to thermally treat military munitions and explosives contaminated items by Open Burn (OB) on Range 62 in the units numbered 8763 and 8764. The hazardous waste can be generated from sources outlined in Section II.B2.6 of the permit application. In the event that items meeting Department of Defense (DOD) criteria are composed of explosive items not listed in Tables I and II in Section II.B of the permit application, Department approval must be obtained to perform Open Burning. Additional requirements follow:
- a. The Open Burn activities may only be accomplished by Explosive Ordnance Detachment (EOD) Personnel and under the following conditions:

# (1) Daylight hours;

- (2) Wind speeds greater than 3 mph and less than or equal to 15 mph;
- (3) No electrical storms within 3 miles of the OB Unit;
- (4) No forecast of a major storm; and
- (5) No inversion forecast.
- b. The integrity of the OB Units must be evaluated each year and a report submitted and signed by a Professional Engineer.
- c. The OB operation may be initiated by placing dunnage (wood and fiber board) in the OB Unit and igniting it along with the explosives with 50-100 gallons of virgin diesel fuel. The fuel should be minimized to that absolutely necessary to accomplish the OB mission.
- d. The combination of explosives and dunnage in the OB containers shall allow for a free-board height of at least 2 feet in order that ejected particles are minimized during the operation.
- e. Upon completion of the burn (at least 12 hours and not longer than 24 hours) EOD personnel shall inspect the area for ejected particles and dispose of them properly.
- f. The OB units shall be decontaminated by cleaning and washing down after each burn event. The residue shall be collected and tested to determine if the waste is a characteristic hazardous waste. The wash down water may remain in the OB unit until the test is completed on the residue.
- (1) If the residue is shown to be a characteristic waste, the water shall be disposed of as a hazardous waste.
- (2) If the residue is not a hazardous waste, the water may remain in the OB unit to evaporate.
- g. After the OB event is concluded and the unit is decontaminated, a precipitation cover shall be placed over the OB unit.
- 2. The Permittee is allowed to thermally treat by Open Detonation (OD) military munitions at a designated location on Range 52 North and Range 62 as described in the permit application in Sections II-A and III-A. The hazardous waste can be generated from sources outlined in Section II.B.2.6 of the permit application.
- a. The OD operations shall only be performed by EOD personnel in accordance with standard Explosive Disposal Ordnance Procedures and under the conditions listed above in Paragraph 1a (1) to 1a (5).
- b. The Net Explosive Weight (NEW) treated by OD operation shall not exceed that outlined in Section III.C6a of the permit application.
- c. At the conclusion of the operation the EOD personnel shall visually inspect fragments to determine if energetic residue remains. Those fragments containing residue will be detonated in place.

- d. All non-explosive scrap metal produced during the OD operation shall be collected and disposed of at the Eglin Defense Reutilization and Marketing Office for recycling.
- 3. The permittee shall comply with waste compatibility requirements of  $40\ \text{CFR}$  264.17(b).
- 4. The permittee shall provide adequate fire protection to assure confinement and control of any fire resulting from the operation, as specified in Section II.D1.4 of the permit application.
- 5. The permittee shall maintain an operating record describing the OB/OD activities. The report shall include the following information:
- a. Description and quantity of each hazardous waste received and treated at the unit.
  - b. Dates of its treatment.
- c. Summary reports and details of all incidents that require implementation of the contingency plan at the unit.
- d. Weather conditions to include humidity, weather forecast, wind speed and wind direction at each event.
- e. Copies of manifests showing disposition of burn residues and/or the quantity of burn residues on site at the end of the reporting period.
  - f. Air monitoring data collected pursuant to Part VI of this permit.
- g. Details of any problems discovered during inspections conducted and details of remedial actions taken.
- 6. The permittee shall maintain compliance with the environmental performance standards listed in 40 CFR 264.601 at all times.

# PART V - Groundwater Monitoring

- 1. Upon Permit issuance, the facility shall be in Detection Monitoring in accordance with 40 CFR 264.98.
- 2. The Waste Management Areas (40 CFR 264.95 (b)) shall be designated by imaginary lines circumscribing the OD unit of Range C-52 and OB/OD unit of Range C-62 as indicated in Attachment  $\bf 1$  of this permit.
- 3. The Point of Compliance (POC) (40 CFR 264.95 (a)) for Waste Management Area C-62 shall be the west and southwest boundaries of Range C-62, and the POC for Waste Management Area C-52 shall be the southwest, south and southeast boundaries of Range C-52, as shown on the Attachment 2 of this permit.
  - 4. The POC wells and the background wells shall be as follows:
    - a. MW-94-62-02, MW-94-62-03, MW-92-62-04,

b. MW-94-52-02, MW-94-52-03 for Range C-52.

The background wells are MW-94-62-01 for Range C-62 and MW-94-52-01 for Range C-52. If future groundwater elevation monitoring indicates a change in groundwater flow direction, this Permit may be modified to require the installation of additional monitoring wells and to make other necessary revisions to the groundwater monitoring plan.

- 5. Upon permit issuance and pursuant to 40 CFR 264.98(d), the permittee shall perform replicate sampling for all constituents listed in Specific Condition 11 of this Part on monitor wells MW-94-62-01, MW-94-62-02, MW-94-62-03, MW-92-62-04, MW-92-62-05, MW-94-52-01, MW-94-52-02 and MW-94-52-03 in February, May, August, and November for the first year, pursuant to 40 CFR 264.98(d). Upon completion of the 12 month ground water monitoring, a review of the monitoring data shall be conducted and this permit modified to incorporate any changes deemed necessary to the monitoring program. A sequence of at least four discrete samples, per well, per sampling event, shall be taken at intervals that assure, to the greatest extent technically feasible, that each sample taken is an independent sample. Upon completion of four quarter groundwater monitoring, a review of the monitoring data shall be conducted and this permit modified to incorporate any changes deemed necessary to the monitoring program.
- 6. The permittee shall submit to the Department groundwater monitoring reports that include information required pursuant to Specific Conditions 6, 8, 9, 13 and 16 of this Part. The groundwater monitoring data from the February sampling event shall be submitted no later than the last day of April; the data from the May sampling event shall be submitted no later than the last day of July; the data from the August sampling event shall be submitted no later than the last day of October; the data from the November sampling event shall be submitted no later than the last day of next January. If, for any reason, the permittee is unable to submit these reports within the specified time, the permittee must comply with General Condition 8.
- 7. All analyses shall be performed on unfiltered groundwater samples. Analyses on filtered samples may be performed for the facility's own use [Rule 62-730.220(5)(h)(2)].
- 8. The permittee shall measure groundwater elevations every time any well is sampled prior to each sampling event (40 CFR 264.97(f)). All groundwater elevations must be measured within the same eight hour period. These data shall be used to determine the quarterly groundwater flow directions and flow rates.
- 9. Total depth of all wells must be determined by physical measurement in August of every year to determine if siltation of any well has occurred. The discovery and repair shall be reported to the Department within 15 calendar days of such event.
- 10. All groundwater sampling and analysis shall be conducted in accordance with the Quality Assurance Project Plan (QAPP). The permittee shall revise the QAPP whenever there is a change in sampling and/or analytical procedures, including field organization or laboratory. The revised plan or revisions must be

submitted to the Department for approval of such changes prior to the sampling event under the revised QAPP.

11. The permittee shall sample all wells, specified in Specific Condition 6 of this Part, for the following parameters:

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1,3-dinitrobenzene (1,3-DNB)
2,4-dinitrotoluene (2,4-DNT)
2,6-dinitrotoluene (2,6-DNT)
4-amino-2,6-dinitrotoluene (4-Am-DNT)
2-amino-4,6-dinitrotoluene (2-Am-DNT)
HMX (Octahydro-1,3,5,7-tetranitro-1,3,5,7-tetrazocine)
dibutylphathalate
nitrate
nitrite
                                     2-nitrotoluene(2-NT)
3-nitrotoluene (3-NT)
                                     4-nitrotoluene(4-NT)
nitroglycerine
                                     nitroguanidine
PETN (pentareythritol tetranitrate)
RDX(hexahydro-1,3,5-trinitro-1,3,5-triazine)
1,3,5-trinitrobenzene (1,3,5-TNB)
2,4,6-trinitrotoluene (2,4,6-TNT)
tetryl
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The permittee shall also sample all wells at Range C-62 for the following additional parameters:

benzene ethylbenzene toluene xylene

12. The Maximum Contaminant Level (MCL) (40 CFR 264.94 and 1994 Florida Ground Water Concentration Guidelines) for the constituents in Specific Condition 12 of this Part are as follows:

PARAMETERS	UNIT	CONCENTRATION		
benzene	μg/l	1		
1,3-dinitrobenzene	μg/l	50		
2,4-dinitrotoluene	μg/l	0.2		
2,6-dinitrotoluene	μg/l	0.2		
4-amino-2,6-dinitrotoluene	μg/l	PQL		
2-amino-4,6-dinitrotoluene	μg/l	PQL		
ethylbenzene	μg/l	30		
HMX	μg/l	1800		
nitrate	μg/l	10,000		
nitrite	μg/l	1000		
nitrogen, ammonia	μg/l	PQL		
nitrogen, total	μg/l	PQL		
nitroglycerine	μg/l	PQL		
nitroguanidine	μg/l	700		
2-nitrotoluene	μg/l	61		
3-nitrotoluene	μg/l	61		
4-nitrotoluene	μg/l	61		
PETN	μg/l	PQL		

RDX	μg/l	10
sulfate	μg/l	250,000
sulfide		PQL
1,3,5-trinitrobenzene	μg/l	60
2,4,6-TNT	μg/l	10
tetryl	μg/l	370
toluene	μg/l	40
xylene	μg/l	20

 $\mu g/l = microgram per liter$ 

PQL = practical quantitation limit, which is the minimum concentration of a chemical that can be measured and reported in accordance with the Quality Assurance Project Plan.

- If, during any sampling event, for any constituent, the background value is higher than the PQL or MCL as stated here, the background value will be used as the MCL rather than the PQL for that sampling event.
- 13. The permittee shall use the appropriate statistical procedure(s) included in the EPA guidance document "Statistical Analysis of Ground-water Monitoring Data at RCRA Facilities, dated April, 1989" to determine the statistical significance of evidence of contamination for any constituents listed in Specific Condition 11 of this part in accordance with 40 CFR Part 264.98. The facility may propose an alternate statistical test, subject to Department approval.
- 14. The permittee shall, at a minimum, inspect the integrity of groundwater monitoring wells during each groundwater monitoring event and notify the Department in writing of any damage requiring repair (not maintenance) to the groundwater monitoring wells and provide a schedule for repair within seven calendar days. A description of repairs shall be provided within seven calendar days after the damage has been corrected.
- 15. Abandonment of monitoring wells shall be performed in accordance with Rule 62-532.500 (4), F.A.C.
- 16. If the permittee determines that there is a statistically significant exceedence of MCLs or background concentrations for any hazardous constituent(s), unless it can be demonstrated that these exceedences are caused by another source or are artifacts of sampling or are the result of errors in analysis or statistical evaluation or are due to natural variations in the groundwater, the permittee shall:
- a. Notify the Department within seven calendar days of the results of statistical tests confirming contamination.
- b. Sample the groundwater at the well most representative of the groundwater quality at the associated Waste Management Area and determine whether constituents listed in 40 CFR Part 264 Appendix IX are present, and if so, in what concentration.
- c. For any 40 CFR Part 264, Appendix IX compounds detected in the analysis pursuant to Specific Condition 16.b of this Part, the permittee may resample

within one month to repeat the analysis for those newly detected constituents unless it can be demonstrated the occurrence of these constituents is due to other source or error. If the results of the second analysis confirm the initial results, then these newly detected constituents will be included in the compliance monitoring list provided in Specific Condition 6 this part. If the permittee chooses not to resample for the newly detected compounds, then they will form the basis along with the parameters already sampled for compliance monitoring.

- d. Within 90 calendar days, the permittee must submit an application for a permit modification, with appropriate fees, to establish a compliance monitoring program that meets the requirements of 40 CFR 264.99 and Rules 62-4.050, and 62-730.900(2) Part II.M.8, F.A.C.
- 17. The permittee shall provide opportunities for site inspections and sample splits with the Department by informing the Department at least 14 working days in advance of all monitoring well sampling.

# PART VI - Air Monitoring Requirements

- 1. The permittee shall perform ambient air monitoring for the first 12 months at locations both upwind and downwind of Ranges C-52 and C-62 (locations are outlined in the permit application, Appendix O, figures 2-2 and 2-3) to determine the ambient impacts of OB/OD operations.
- a. The monitoring equipment shall collect 24 hour Total Suspended Particulate (TSP) samples during each OB/OD event. The equipment should be made operational to allow for air sampling for approximately 12 hours prior to the event and 12 hours after the event.
- b. The monitoring equipment shall be analyzed for TSP, Barium, Lead, and Magnesium.
- c. Upon completion of the 12 month ambient air monitoring, a review of the monitoring data shall be conducted and this permit modified to incorporate any changes deemed necessary to the monitoring program.

# PART VII - Closure

- 1. The permittee shall close the OB/OD Units on Ranges C-52 North and C-62 in accordance with the provisions outlined in Section II.F of the permit application. The units shall be closed as follows:
- a. Metallic materials shall be collected and segregated to insure that any unexploded ordnance is properly treated before the metals are transported to the Defense Reutilization and Marketing Office at Eglin for recycling.
- b. The burn kettles shall be decontaminated by washing and steam cleaning. Following decontamination, the burn kettles shall be sampled with surface wipe testing and analyzed for the following parameters: reactivity, arsenic, barium, cadmium, chromium, lead, mercury, selenium, silver, 2,4 DNT and explosives. When decontamination is considered complete, the burn kettles may be removed from the range for recycling.

- c. Soil sampling in the vicinity of the burn kettles shall be conducted before decontamination, after decontamination, and after the burn kettles are removed. A minimum of four samples from each burn kettle location shall be taken and analyzed for the Appendix VIII constituents.
- d. Groundwater sampling shall be conducted in accordance with Part V of this permit.
- e. This permit shall be modified to include post closure activities if clean closure cannot be achieved.

## PART VIII - General

- 1. The permittee shall apply for a closure permit at least 180 days prior to beginning closure at the facility. Florida Administrative Code Rule 62.730.260.
- 2. Prior to 135 days before expiration of this permit, the permittee shall apply for a permit renewal in accordance with the provisions of Rule 62.730.300(1) F.A.C.
- 3. If the permittee receives hazardous waste from an off-site source, he must inform the generator in writing that he has the appropriate permit for, and will accept the waste the generator is shipping. The permittee must keep a copy of the written notice as part of the operation record. 40 CFR 264.12
- 4. Upon written request by the permittee, the Department may make minor modifications to the permit. Rule 62-730.290.
- 5. The Department may modify, revoke, reissue, or terminate for cause this permit in accordance with the provisions of Rule 62-730 FAC. The filing of a request for a permit modification, revocation, resistance, or termination, or the notification of planned changes or anticipated noncompliance on the part of the permittee does not stay the applicability or enforceability of any permit condition. The permittee may submit any subsequent revisions to the Department for approval. Should these revisions constitute a major modification to the permit, the permittee shall meet the requirements of Rule 62-730.290.
- 6. Four copies of submittals in response to the Permit, except submittals required by Specific condition 2 of this Part, shall be submitted as follows:
  - a. One copy shall be sent to:

Hazardous Waste Section Supervisor
Department of Environmental Protection
160 Governmental Center
Pensacola, Florida 32501

b. Two copies shall be sent to:

Administrator
Hazardous Waste Regulation Section
Bureau of Solid and Hazardous Waste
Department of Environmental Protection

2600 Blair Stone Road Tallahassee, Florida 32399-2400

c. One copy shall be sent to:

Chief, Waste Management Division US EPA - Region IV 100 Alabama St., SW Atlanta, Georgia 30303-3104

- 7. All documents submitted pursuant to the conditions of this Permit shall be accompanied by a cover letter stating the name and date of the document submitted, the number(s) of the Specific Condition(s) affected, and the Permit number and project name of the permit involved. All documents modifying the approved Closure and/or Post-Closure Plan submitted to the Department for review shall be signed, sealed, and certified by a Professional Engineer registered in the State of Florida, in accordance with Rule 62-730.220(7), F.A.C. and as required by General Condition 16.d of this permit or open burn units.
- 8. All submittals incorporating interpretations of geological data shall be signed and sealed by a Professional Geologist registered in the State of Florida in accordance with Section 492, F.S., and Rule 62-730.220(8), F.A.C.

	to the Department within 30 days of such changes with ified in Chapter 62-4, F.A.C.
Expiration date:	Issued thisday of , 1996.
September 1, 2001	
STATE OF FLORIDA DEPARTMENT	
OF ENVIRONMENTAL PROTECTION	BOBBY A. COOLEY  Director of District Management
EGLIN AIR FORCE BASE FACILITY OWNER	STEWART E. CRANSTON, Maj.Gen., USAF Commander
EGLIN AIR FORCE BASE	
FACILITY OPERATOR	CARL J. WILES, JR., Colonel, USAF Base Civil Engineer
EGITN ATT FORGE DAGE	
EGLIN AIR FORCE BASE	MICHAEL R. NEWBERRY, Lt. Col., USAF, BSC Director, Environmental Management

9. The permittee shall revise "Part I - General" of the  $\underline{\text{Application for a}}$ 

 $\underline{\texttt{Haza} \textbf{62} \bullet \textbf{13} \texttt{0W2} \textbf{80} \textbf{6} \textbf{£2} \textbf{Fac} \textbf{£1} \underline{\texttt{At}} \textbf{\cancel{C}}. \\ \textbf{Pewmithin} \textbf{R3} \underline{\texttt{Medays}} \text{ of any changes in the Part I.} \\ \textbf{The revised "Part I}$ 

Permit Modification #4 is issued under the provisions of Chapter 403-722, Florida Statutes, and Florida Administrative Code Rule(s) 62-4, 62-530, 62-550 and 62-730. The above named permittee is hereby authorized to perform the work or operate the facility shown on the application and approved drawing(s), plans, and other documents attached hereto or on file with the Department and made a part hereof and specifically described as follows:

To operate a hazardous waste miscellaneous unit on Ranges #52 North and #62. The operation will consist of open burning and open detonation of waste explosives on Range 62 and open detonation of waste explosives on Range 52 North.

The open burn unit consists of two steel burn kettles 20 feet long, 8 feet wide and 8 feet high. Sides and bottom are constructed of 1/2 inch steel plate continuously welded on the interior with a reinforced 4 inch by 3 inch by 1/4 inch rectangular tubing top rail. Side walls and bottom are reinforced with 4 inch by 5.4 pounds per foot structural channel on 30 inch centers. One end of each burn kettle has doors that are 1/2 inch plate with a 4 inch by 5.4 pounds per foot structural channel reinforcement. A 6 inch steel dam is welded at the door opening to the burn kettle where wastes are placed to provide additional containment of virgin fuel used to initiate burning. Each burn kettle is underlain with 2 feet of compacted soil and a 6 millimeter Kevlar reinforced polyethylene liner.

Open Detonation (OD) operations occur at locations on Range 52 North and Range 62 directly on the ground surface. Craters formed by previous OD operations are used for OD events. Soon after the OD unit can be safely approached following completion of a detonation (generally within one hour of the detonation), the OD unit is inspected for any items which remain after detonation. Negligible quantities of ash are generated from the OD operations. Items still containing energetic material are detonated immediately. Large metallic items not containing energetic materials are transported to the Defense Reutilization and Marketing Office for recycle/resale.

Operation of the facility will be in accordance with the revised Permit Application dated May 10, 1995, the information discussed on August 30, 1995 (minutes dated September 11), the information received on November 2, 1995 and the Quality Assurance/Project Assurance Plan received on May 3, 1996.

GENERAL CONDITIONS: No change from existing permit.

SPECIFIC CONDITIONS: FOR MISCELLANEOUS UNIT:

# PART I - General Operating Requirements

1. The permittee shall maintain the facility to minimize the possibility of fire, explosion, or any unplanned sudden or non sudden release of hazardous waste or hazardous waste constituents to air, soil, or surface water which could threaten human health or the environment, in accordance with 40 CFR 264.31 and 40 CFR 264.601.

- 2. The permittee shall follow the procedures described in the waste analysis plan, Section II.B.2 of the Permit Application (40 CFR 264.13(b)).
- 3. The permittee shall comply with the following conditions concerning preparedness and prevention:
- a. At a minimum, the permittee shall equip the facility with the equipment described in the contingency plan, Section II.C, Tables II.6 through II-8 of the Permit Application, as required by 40 CFR 264.32.
- b. The permittee shall test and maintain the equipment specified in Specific Condition 4(a), of this part, as necessary to assure its proper operation in time of emergency, as required by 40 CFR 264.33.
- 4. The permittee shall comply with the following conditions concerning the contingency plan:
- a. The permittee shall immediately carry out the provisions of the contingency plan, Section II.D of the Permit Application.
- b. The Department of Environmental Protection's 24 hour emergency telephone number is (904) 413-9911. During normal business hours, the Department's Northwest District Office may be contacted at (904) 444-8360.

#### PART II - Waste Minimization

- 1. In the event that the permittee treats, stores, or disposes of hazardous wastes on-site where such wastes were generated, then the permittee must comply with 40 CFR part 264.73(b)(9), and the permittee must certify, no less often than annually, that:
- a. The permittee has a program in place to reduce the volume and toxicity of hazardous waste generated to the degree determined by the permittee to be economically practicable;
- b. The proposed method of treatment, storage or disposal is the most practicable method available to the permittee which minimizes the present and future threat to human health and the environment; and,
- c. The permittee shall maintain copies of certification in the facility operating record as required by 40 CFR 264.73(b)(9).
- 2. If the waste minimization program, as detailed in Specific Conditions 12a. and 12b. of this part, is applicable, then the permittee shall, at a minimum, address the following elements:
  - a. Top management support
- 1. A dated and signed policy describing management support for waste minimization and for implementation of a waste minimization plan,

- 2. A description of employee awareness and training programs designed to involve employees in waste minimization planning and implementation to maximize the extent feasible, and
- 3. A description of how a waste minimization plan has been incorporated into management practices so as to ensure ongoing efforts with respect to produce design, capital planning, production operations, and maintenance;

## b. Characterization of waste generation

1. Identification of types, amounts, and hazardous constituents of waste streams, with the source and date of generation;

## c. Periodic waste minimization assessments

- 1. Identification of all points in a process where materials can be prevented from becoming a waste, or can be recycled,
- Identification of potential waste reduction and recycling techniques applicable to each waste, with a cost estimate for capital investment and implementation,
- Description of technically and economically practical waste reduction/recycling options to be implemented, and a planned schedule for implementation,
- 4. Specific performance goals, preferably quantitative, for the source reduction of waste by stream. Whenever possible, goals should be stated as weight of waste generated per standard unit of production, as defined by the generator.

## d. Cost allocation system

- 1. Identification of waste management costs for each waste, factoring in liability, transportation, recordkeeping, personnel, pollution control, treatment, disposal, compliance, and oversight costs to the extent feasible,
- $\,$  2. Description of how departments are held accountable for the wastes they generate,
- 3. Comparison of waste management costs with costs of potential reduction and recycling techniques applicable to each waste;

# e. Technology transfer

1. Description of efforts to seek and exchange technical information on waste minimization from other parts of the company, other firms, trade associations, technical assistance programs, and professional consultants;

# f. Program evaluation

 Description of types and amounts of hazardous waste reduced or recycled,

- 2. Analysis and quantification of progress made relative to each performance goal established and each reduction technique to be implemented,
  - 3. Amendments to waste minimization plan and explanation,
- 4. Explanation and documentation of reduction efforts completed or in progress before development of the waste minimization plan, and
- 5. Explanation and documentation regarding impediments to hazardous waste reduction specific to the individual facility.

## Part III - Land Disposal

- 1. 40 CFR Part 268 identifies hazardous wastes that are restricted from land disposal and defines those limited circumstances in which an otherwise prohibited waste may continue to be placed on or in a land treatment, storage, or disposal unit. The permittee shall maintain compliance with the requirements of 40 CFR Part 268. If the permittee has applied for an extension, waiver, or variance under 40 CFR Part 268, the permittee shall comply with all restrictions on land disposal under this Part once the effective date for the waste has been reached pending final approval of such application.
- 2. A restricted waste identified in 40 CFR Part 268, Subpart C may not be placed in a land disposal unit without further treatment unless the requirements of 40 CFR Part 268, Subparts C and/or D are met.
- 3. The storage of hazardous wastes restricted from land disposal under 40 CFR Part 268 is prohibited unless the requirements of 40 CFR Part 268, Subpart E are met.

## PART IV - Thermal Treatment Unit

- 1. The permittee is allowed to thermally treat military munitions and explosives contaminated items by Open Burn (OB) on Range 62 in the units numbered 8763 and 8764. The hazardous waste can be generated from sources outlined in Section II.B2.6 of the Permit Application. In the event that items meeting Department of Defense (DOD) criteria are composed of explosive items not listed in Tables I and II in Section II.B of the Permit Application, Department approval must be obtained to perform Open Burning. Additional requirements follow:
- a. The Open Burn activities may only be accomplished by Explosive Ordnance Detachment (EOD) Personnel and under the following conditions:
  - (1) Daylight hours;
  - (2) Wind speeds greater than 3 mph and less than or equal to 15 mph;
  - (3) No electrical storms within 3 miles of the OB Unit;
  - (4) No forecast of a major storm; and
  - (5) No inversion forecast.
- b. The integrity of the OB Units must be evaluated each year and a report submitted and signed by a Professional Engineer.

- c. The OB operation may be initiated by placing dunnage (wood and fiber board) in the OB Unit and igniting it along with the explosives with 50-100 gallons of virgin diesel fuel. The fuel should be minimized to that absolutely necessary to accomplish the OB mission.
- d. The combination of explosives and dunnage in the OB containers shall allow for a free-board height of at least 2 feet in order that ejected particles are minimized during the operation.
- e. Upon completion of the burn (at least 12 hours and not longer than 24 hours) EOD personnel shall inspect the area for ejected particles and dispose of them properly.
- f. The OB units shall be decontaminated by cleaning and washing down after each burn event. The residue shall be collected and tested to determine if the waste is a characteristic hazardous waste. The wash down water may remain in the OB unit until the test is completed on the residue
- (1) If the residue is shown to be a characteristic waste, the water shall be disposed of as a hazardous waste.
- (2) If the residue is not a hazardous waste, the water may remain in the OB unit to evaporate.
- g. After the OB event is concluded and the unit is decontaminated, a precipitation cover shall be placed over the OB unit.
- 2. The Permittee is allowed to thermally treat by Open Detonation (OD) military munitions at a designated location on Ranges 52 North and 62 as described in the Permit Application in Sections II-A and III-A. The hazardous waste can be generated from sources outlined in Section II.B.2.6 of the Permit Application.
- a. The OD operations shall only be performed by EOD personnel in accordance with standard Explosive Disposal Ordnance Procedures and under the conditions listed above in Paragraph 1a (1) to 1a (5).
- b. The Net Explosive Weight (NEW) treated by OD operation shall not exceed that outlined in Section III.C6a of the Permit Application.
- c. At the conclusion of the operation the EOD personnel shall visually inspect fragments to determine if energetic residue remains. Those fragments containing residue will be detonated in place.
- d. All non-explosive scrap metal produced during the OD operation shall be collected and disposed of at the Eglin Defense Reutilization and Marketing Office for recycling.
- 3. The permittee shall comply with waste compatibility requirements of  $40\ \text{CFR}$  264.17(b).
- 4. The permittee shall provide adequate fire protection to assure confinement and control of any fire resulting from the operation, as specified in Section II.D1.4 of the Permit Application.

- 5. The permittee shall maintain an operating record describing the OB/OD activities. The report shall include the following information:
- a. Description and quantity of each hazardous waste received and treated at the unit.
  - b. Dates of its treatment.
- c. Summary reports and details of all incidents that require implementation of the contingency plan at the unit.
- d. Weather conditions to include humidity, weather forecast, wind speed and wind direction at each event.
- e. Copies of manifests showing disposition of burn residues and/or the quantity of burn residues on site at the end of the reporting period.
  - f. Air monitoring data collected pursuant to Part VI of this permit.
- g. Details of any problems discovered during inspections conducted and details of remedial actions taken.
- 6. The permittee shall maintain compliance with the environmental performance standards listed in 40 CFR 264.601 at all times.

## PART V - Groundwater Monitoring

- 1. Upon Permit issuance, the facility shall be in Detection Monitoring in accordance with 40 CFR 264.98.
- 2. The Waste Management Areas (40 CFR 264.95 (b)) shall be designated by imaginary lines circumscribing the OD unit of Range C-52 and OB/OD unit of Range C-62 as indicated in Attachment  ${\color{blue}1}$  of this permit.
- 3. The Point of Compliance (POC) (40 CFR 264.95 (a)) for Waste Management Area C-62 shall be the west and southwest boundaries of Range C-62, and the POC for Waste Management Area C-52 shall be the southwest, south and southeast boundaries of Range C-52, as shown on the Attachment 2 of this permit.
- 4. The POC wells and the background wells shall be as follows:
  - a. MW-94-62-02, MW-94-62-03, MW-92-62-04, MW-92-62-05 for Range C-62.
  - b. MW-94-52-02, MW-94-52-03 for Range C-52.

The background wells are MW-94-62-01 for Range C-62 and MW-94-52-01 for Range C-52. If future groundwater elevation monitoring indicates a change in groundwater flow direction, this Permit may be modified to require the installation of additional monitoring wells and to make other necessary revisions to the groundwater monitoring plan.

- 5. Upon permit issuance and pursuant to 40 CFR 264.98(d), the permittee shall perform replicate sampling for all constituents listed in Specific Condition 11 of this Part on monitor wells MW-94-62-01, MW-94-62-02, MW-94-62-03, MW-92-62-04, MW-92-62-05, MW-94-52-01, MW-94-52-02 and MW-94-52-03 in February, May, August, and November for the first year, pursuant to 40 CFR 264.98(d). Upon completion of the 12 month ground water monitoring, a review of the monitoring data shall be conducted and this permit modified to incorporate any changes deemed necessary to the monitoring program. A sequence of at least four discrete samples, per well, per sampling event, shall be taken at intervals that assure, to the greatest extent technically feasible, that each sample taken is an independent sample. Upon completion of four quarter groundwater monitoring, a review of the monitoring data shall be conducted and this permit modified to incorporate any changes deemed necessary to the monitoring program.
- 6. The permittee shall submit to the Department groundwater monitoring reports that include information required pursuant to Specific Conditions 6, 8, 9, 13 and 16 of this Part. The groundwater monitoring data from the February sampling event shall be submitted no later than the last day of April; the data from the May sampling event shall be submitted no later than the last day of July; the data from the August sampling event shall be submitted no later than the last day of October; the data from the November sampling event shall be submitted no later than the last day of next January. If, for any reason, the permittee is unable to submit these reports within the specified time, the permittee must comply with General Condition 8.
- 7. All analyses shall be performed on unfiltered groundwater samples. Analyses on filtered samples may be performed for the facility's own use [Rule 62-730.220(5)(h)(2)].
- 8. The permittee shall measure groundwater elevations every time any well is sampled prior to each sampling event (40 CFR 264.97(f)). All groundwater elevations must be measured within the same eight hour period. These data shall be used to determine the quarterly groundwater flow directions and flow rates.
- 9. Total depth of all wells must be determined by physical measurement in August of every year to determine if siltation of any well has occurred. The discovery and repair shall be reported to the Department within 15 calendar days of such event.
- 10. All groundwater sampling and analysis shall be conducted in accordance with the Quality Assurance Project Plan (QAPP). The permittee shall revise the QAPP whenever there is a change in sampling and/or analytical procedures, including field organization or laboratory. The revised plan or revisions must be submitted to the Department for approval of such changes prior to the sampling event under the revised QAPP.
- 11. The permittee shall sample all wells, specified in Specific Condition 5 of this Part, for the following parameters:
  - 1,3-dinitrobenzene (1,3-DNB)
  - 2,4-dinitrotoluene (2,4-DNT)
  - 2,6-dinitrotoluene (2,6-DNT)
  - 4-amino-2,6-dinitrotoluene (4-Am-DNT)

The permittee shall also sample all wells at Range C-62 for the following additional parameters:

benzene ethylbenzene toluene xylene

12. The Maximum Contaminant Level (MCL) (40 CFR 264.94 and 1994 Florida Ground Water Concentration Guidelines) for the constituents in Specific Condition 12 of this Part are as follows:

PARAMETERS	UNIT	CONCENTRATION			
benzene	μg/l	1			
1,3-dinitrobenzene	μg/l	50			
2,4-dinitrotoluene	μg/l	0.2			
2,6-dinitrotoluene	μg/l	0.2			
4-amino-2,6-dinitrotoluene	μg/l	PQL			
2-amino-4,6-dinitrotoluene	μg/l	PQL			
ethylbenzene	μg/l	30			
HMX		μg/l	1800		
nitrate	μg/l	10,000			
nitrite	μg/l	1000			
nitrogen, ammonia	μg/l	PQL			
nitrogen, total	μg/l	PQL			
nitroglycerine	μg/l	PQL			
nitroguanidine	μg/l	700			
2-nitrotoluene	μg/l	61			
3-nitrotoluene	μg/l	61			
4-nitrotoluene	μg/l	61			
PETN		μg/l	PQL		
RDX	μg/l	10			
sulfate	μg/l	250,000			
sulfide		PQL			
1,3,5-trinitrobenzene	μg/l	60			
2,4,6-TNT		μg/l	10		
tetryl	μg/l	370			
toluene	μg/l	40			
xylene	μg/l	20			

- $\mu g/l = microgram per liter$
- ${\tt PQL}$  = practical quantitation limit, which is the minimum concentration of a chemical that can be measured and reported in accordance with the Quality Assurance Project Plan.
- If, during any sampling event, for any constituent, the background value is higher than the PQL or MCL as stated here, the background value will be used as the MCL rather than the PQL for that sampling event.
- 13. The permittee shall use the appropriate statistical procedure(s) included in the EPA guidance document "Statistical Analysis of Ground-water Monitoring Data at RCRA Facilities, dated April, 1989" to determine the statistical

significance of evidence of contamination for any constituents listed in Specific Condition 11 of this part in accordance with 40 CFR Part 264.98. The facility may propose an alternate statistical test, subject to Department approval.

- 14. The permittee shall, at a minimum, inspect the integrity of groundwater monitoring wells during each groundwater monitoring event and notify the Department in writing of any damage requiring repair (not maintenance) to the groundwater monitoring wells and provide a schedule for repair within seven calendar days. A description of repairs shall be provided within seven calendar days after the damage has been corrected.
- 15. Abandonment of monitoring wells shall be performed in accordance with Rule 62-532.500 (4), F.A.C.
- 16. If the permittee determines that there is a statistically significant exceedence of MCLs or background concentrations for any hazardous constituent(s), unless it can be demonstrated that these exceedences are caused by another source or are artifacts of sampling or are the result of errors in analysis or statistical evaluation or are due to natural variations in the groundwater, the permittee shall:
- a. Notify the Department within seven calendar days of the results of statistical tests confirming contamination.
- b. Sample the groundwater at the well most representative of the groundwater quality at the associated Waste Management Area and determine whether constituents listed in 40 CFR Part 264 Appendix IX are present, and if so, in what concentration.
- c. For any 40 CFR Part 264, Appendix IX compounds detected in the analysis pursuant to Specific Condition 16.b of this Part, the permittee may resample within one month to repeat the analysis for those newly detected constituents unless it can be demonstrated the occurrence of these constituents is due to other source or error. If the results of the second analysis confirm the initial results, then these newly detected constituents will be included in the compliance monitoring list provided in Specific Condition 6 this part. If the permittee chooses not to resample for the newly detected compounds, then they will form the basis along with the parameters already sampled for compliance monitoring.

- d. Within 90 calendar days, the permittee must submit an application for a permit modification, with appropriate fees, to establish a compliance monitoring program that meets the requirements of 40 CFR 264.99 and Rules 62-4.050, and 62-730.900(2) Part II.M.8, F.A.C.
- 17. The permittee shall provide opportunities for site inspections and sample splits with the Department by informing the Department at least three working days in advance of all monitoring well sampling.

## PART VI - Air Monitoring Requirements

- 1. The permittee shall perform ambient air monitoring for the first 12 months at locations both upwind and downwind of Ranges C-52 and C-62 (locations are outlined in the Permit Application, Appendix O, figures 2-2 and 2-3) to determine the ambient impacts of OB/OD operations.
- a. The monitoring equipment shall collect 24 hour Total Suspended Particulate (TSP) samples during each OB/OD event. The equipment should be made operational to allow for air sampling for approximately 12 hours prior to the event and 12 hours after the event.
- b. The monitoring equipment shall be analyzed for TSP, Barium, Lead, and Magnesium.
- c. Upon completion of the 12 month ambient air monitoring, a review of the monitoring data shall be conducted and this permit modified to incorporate any changes deemed necessary to the monitoring program.

#### PART VII - Closure

- 1. The permittee shall close the OB/OD Units on Ranges C-52 North and C-62 in accordance with the provisions outlined in Section II.F of the permit application. The units shall be closed by:
- a. Metallic materials shall be collected and segregated to insure that any unexploded ordnance is properly treated before the metals are transported to the Defense Reutilization and Marketing Office at Eglin for recycling.
- b. The burn kettles shall be decontaminated by washing and steam cleaning. Following decontamination, the burn kettles shall be sampled with surface wipe testing and analyzed for the following parameters: reactivity, arsenic, barium, cadmium, chromium, lead, mercury, selenium, silver, 2,4 DNT and explosives. When decontamination is considered complete, the burn kettles may be removed from the range for recycling.
- c. Soil sampling in the vicinity of the burn kettles shall be conducted before decontamination, after decontamination, and after the burn kettles are removed. A minimum of four samples from each burn kettle location shall be taken and analyzed for the Appendix VIII constituents.
- d. Groundwater sampling shall be conducted in accordance with Part V of this permit.
- e. This permit shall be modified to include post closure activities if clean closure cannot be achieved.

## PART VIII - General

- 1. Four copies of submittals in response to the Permit, except submittals required by Specific condition 2 of this Part, shall be submitted as follows: (This condition supersedes Specific Condition 34 in the Operation Permit)
  - a. One copy shall be sent to:

Hazardous Waste Section Supervisor
Department of Environmental Protection
160 Governmental Center
Pensacola, Florida 32501

b. Two copies shall be sent to:

Administrator
Hazardous Waste Regulation Section
Bureau of Solid and Hazardous Waste
Department of Environmental Protection
2600 Blair Stone Road
Tallahassee, Florida 32399-2400

	abama Street, S.W. a, Georgia 30303-3104
storage areas sl Engineer registor F.A.C. All subs signed and seale	tals modifying major engineering features of the hazardous waste hall be worded, signed, and certified by a qualified Professional ered in the State of Florida in accordance with Rule 62-730.220(7), mittals incorporating interpretations of geological data shall be ed by a Professional Geologist registered in the State of Florida ith Section 492, F.S., and Rule 62-730.220(8), F.A.C.
Expiration date	: Issued thisday of , 1996.
September 1, 19	96
	STATE OF FLORIDA DEPARTMENT OF ENVIRONMENTAL PROTECTION
	Bobby A. Cooley Director of District Management
	FILING and ACKNOWLEDGMENT FILED, on this date, pursuant to ion 120.52, Florida Statutes, with the designated Clerk, receipt of h is acknowledged.
Cleri	
mail	This is to certify that this Notice of Permit was ed before the close of business on
	FILING and ACKNOWLEDGMENT FILED, on this date, pursuant to Section 120.52, Florida Statutes, with the designated Clerk, receipt of which is acknowledged.

c. One copy shall be sent to:

US EPA - Region IV

Chief, Waste Management Division

Clerk

Date

			This	is	to	ce	rtify	that	t th:	is	Notice	of	Permit
was	${\tt mailed}$	before	the	clo	se	of	busin	ess	on _				