

MODULE II - GENERAL FACILITY CONDITIONS

II.A. APPLICABILITY

- II.A.1. The requirements of this permit module pertain to all Hazardous Waste Management Units (HWMUs) identified within Module III.
- II.A.2. The Permittee is allowed to receive waste energetics, as defined in Condition III.B. and Attachment 2, from off site for treatment at the TTU.

II.B. DESIGN AND OPERATION OF HAZARDOUS WASTE MANAGEMENT UNITS (HWMUs)

- II.B.1. The Permittee shall design, construct, maintain, and operate the HWMUs to minimize the possibility of a fire or explosion, not authorized by this permit, and of any sudden or non-sudden release of hazardous waste or hazardous waste constituents to air, soil, groundwater, or surface water that could threaten human health and the environment.
- II.B.2. The Permittee shall construct all HWMUs or make substantial changes to existing structures in accordance with designs approved by the Director, except for minor changes deemed necessary by the Permittee and approved by the Director, to facilitate proper construction of the HWMU. Minor deviations from the approved designs to accommodate proper construction and the substitution of equivalent or superior materials or equipment shall be noted on as-built drawings and specifications, and a rationale for those deviations shall be provided in written form.
- II.B.3. After review of the as-built drawings, the Director shall notify the Permittee in writing of any change the Director concludes is not minor and is necessary for proper construction. The Director may notify the Permittee that the permit has been violated by making such changes without Director approval prior to construction and may require the Permittee to remove and replace any construction inconsistent with any approved designs and specifications.
- II.B.4. Prior to commencing construction of any new HWMU(s), the Permittee shall collect background soil samples in accordance with a Director approved Baseline Sampling Plan.
- II.B.5. The Permittee shall only treat waste energetics listed in Attachment 2 unless a permit modification allowing treatment of other wastes has been approved by the Director in accordance with UAC R315-270-41.

II.C. REQUIRED NOTICE

- II.C.1. Hazardous Waste Imports. The Permittee shall notify the Director in writing at least four weeks in advance of the date the Permittee expects to receive waste energetics from a foreign source, as required by UAC R315-264-12(a)(1). Notice of subsequent shipments of the same waste from the same foreign source in the same calendar year is not required.
- II.C.2. Hazardous Waste from Off-Site Sources. When the Permittee is to receive energetic waste from an off-site source, it must inform the generator in writing that the Permittee has the appropriate permits for, and will accept, the waste the generator is shipping. The Permittee must keep a copy of this written notice as part of the Operating Record as required by UAC R315-264-12(b).

II.D. WASTE CHARACTERIZATION AND ANALYSIS

- II.D.1. The Permittee shall comply with the *Waste Characterization Plan* (Attachment 2) to address the waste characterization requirements of UAC R315-270-14(b)(2) and the *Waste Analysis Plan* (Attachment 3) to address the requirements of UAC R315-264-13. The *Waste Characterization Plan* divides the more than 13,000 potential energetic waste items treated at the TTU into subfamilies based on similar constituent makeup. The *Waste Characterization Plan* builds on the information in the DOD Munitions Items Disposition Action System (MIDAS) database, although not all of the munitions treated at the TTU are found in the MIDAS database. Characterization data for items not listed in MIDAS will be obtained as described in Attachment 2. The Permittee shall adhere to the following requirement:
- II.D.1.a. The Permittee shall submit to the Director, by March 1 of each calendar year, a report describing the wastes that were treated at the TTU during the previous calendar year. The report shall certify that the known waste streams have not changed and shall include a description of any changes in the energetic waste information since the last date of the report.

II.E. WASTE ACCEPTANCE

- II.E.1. The Permittee shall follow the *Waste Acceptance Procedures* in the *Waste Analysis Plan* (Attachment 3) of this permit. In addition, the Permittee shall comply with all other conditions involving waste acceptance in Module III.
- II.E.2. Upon receipt of energetic waste at the Facility, all formal requests for treatment from the generator, and associated correspondence must be referenced to each uniform hazardous waste manifest and shall be kept in the operating record. Inspection of each shipment, including confirmation of serial numbers and the

waste description, shall be recorded in the Operating Record and compared to the acceptable parameters and type of energetic waste described in the *Waste Characterization Plan* (Attachment 2).

- II.E.3. The Permittee shall use only energetic waste descriptions presented in the *Waste Characterization Plan* in Attachment 2. Changes in waste descriptions presented in Attachment 2 as a result of an improvement or refinement by the DOD shall be adopted by the Permittee in accordance with Condition II.B.5.

II.F. RISK THRESHOLDS

- II.F.1. The Open Burning and Open Detonation (OB and OD) operations shall be conducted to minimize the risk to human health and the environment. The risk thresholds in Condition III.C.3. for operations at the TTU are based on the risk assessments in Attachments 10A and 10B. The human health risk assessment uses potency factors (slope factors or chronic reference doses) for carcinogens and reference doses for non-carcinogens from the U.S. EPA's Integrated Risk Information System (IRIS) and from the U.S. EPA's Health Effects Assessment Summary Tables (HEAST) databases.
- II.F.2. The Permittee shall submit to the Director for review and approval, by August 1 of every fifth calendar year after issuance of the Permit, an evaluation of the completeness and accuracy of the risk assessments in Attachments 10A and 10B. At a minimum, the evaluation shall include the following information:
- II.F.2.a. A review of the chemicals in Attachments 10A and 10B to add additional emissions as a result of updates in the MIDAS database or other relevant emission data;
- II.F.2.b. A review of the toxicity information (reference doses, cancer slope factors), in Attachments 10A and 10B, to include any new or updated toxicity data;
- II.F.2.c. A review of environmental sampling data acquired since the last evaluation and discussion of how these data affect the risk assessments in Attachments 10A and 10B; and
- II.F.2.d. Any necessary revision to Attachments 10A and 10B that results in an increase in calculated risks at the TTU will be submitted as a permit modification, in accordance with UAC R315-270-42, and by March 1 of the following calendar year.

II.G. SECURITY

- II.G.1. The Permittee shall comply with security conditions and procedures contained in this permit and the *Security Plan* (Attachment 4.)

II.H. GENERAL INSPECTION REQUIREMENTS

- II.H.1. The Permittee shall follow the inspection plans in *TTU Inspection Plan* (Attachment 5) and *Storage in the Missile Storage Area* (Attachment 16). A record of inspections shall be maintained as part of the operating record. In addition, the Permittee shall comply with the following conditions, as well as conditions pertaining to inspections in Module III.
- II.H.2. Any problem that could endanger human health or the environment (transportation spills, etc.) shall be documented in the Operating Record and corrected within 24 hours after the problem is discovered. If the Permittee cannot eliminate the threat within 24 hours, a schedule shall be submitted to the Director within 24 hours of discovery of the problem.
- II.H.3. The Permittee shall remedy any deterioration or malfunction, as required by UAC R315-264-15(c). If the remedy requires more than 72 hours from the time that the problem is detected, the Permittee shall submit to the Director, before the expiration of the 72-hour period, a proposed time schedule for correcting the problem.
- II.H.4. Problems found during the inspections conducted under this Module shall be corrected within the time frames stipulated in Conditions II.H.1. and II.H.2. If, upon determination by the Director or the Permittee, continued operation of the waste management unit involved in the inspection could endanger human health or the environment, the Permittee shall cease operation of the unit until the problem has been corrected.
- II.H.5. The Permittee may make revisions to the Inspection Plans (included as Attachments 5 and 16 of this permit), in accordance with the procedures for Class 1 permit modifications, which require pre-approval from the Director, in accordance with UAC R315-124-5.

II.I. PERSONNEL TRAINING

- II.I.1. The Permittee shall conduct personnel training as required by UAC R315-264-16. This training program shall follow the plan found in *Personnel Training Plan* (Attachment 6). New personnel working with or around hazardous waste shall complete the required personnel training within six months of their hire date or assignment to the facility or to a new position at the facility. In addition, the Permittee shall comply with the following conditions:
- II.I.1.a. The Permittee shall provide training on an annual basis as required by UAC R315-264-16(c).

- II.I.1.b. The Permittee shall maintain training documents and records as required by UAC R315-264-16(d) and UAC R315-264-16(e). These records shall indicate the date the employee was assigned to management of hazardous waste, the type and amount of training received and the date the training was conducted. In addition, the record shall indicate the date of transfer if the change affected the type or amount of training required.
- II.I.1.c. The Permittee shall maintain a copy of the Training Plan at the facility until the facility is fully closed and closure is certified by an independent registered engineer.
- II.J. GENERAL REQUIREMENTS FOR IGNITABLE, REACTIVE, OR INCOMPATIBLE WASTE**
- II.J.1. The Permittee shall comply with the requirements of UAC R315-264-17, the specifications in the *Waste Analysis Plan* (Attachment 3) and the requirements of all applicable National Fire Protection Association (NFPA) and Department of Defense Explosives Safety Board (DDESB) codes and standards.
- II.K. LOCATION STANDARDS**
- II.K.1. The Permittee shall comply with the location standards specified in UAC R315-264-19.
- II.L. PREPAREDNESS AND PREVENTION**
- II.L.1. The Permittee shall follow the Preparedness and Prevention procedures in Attachment 7.
- II.L.2. The Permittee shall equip and maintain, in good operating condition at the facility, the minimum equipment required by UAC R315-264-32. Attachment 7 contains a list of the necessary equipment at the facility.
- II.L.3. The Permittee shall test and maintain the equipment specified in Condition II.L.2, as required by UAC R315-264-33, the NFPA and the DDESB, to assure its proper operation in time of an emergency.
- II.L.4. The Permittee shall maintain records of the preventative maintenance and repair activities specified in Condition II.L.3 and shall keep schedules, reflecting minimum and planned frequency for the performance of preventative maintenance of the equipment at the facility.
- II.L.5. The Permittee shall maintain access to the communications or alarm system as required by UAC R315-264-34, and as outlined in Attachment 7.

II.L.6. The Permittee shall attempt to make arrangements (Coordination Agreements) with State and local authorities as required by UAC R315-264-37. Copies of the Coordination Agreements shall be retained at the respective offices. A list of agreements shall be maintained in the Contingency Plan in Attachment 7.

II.M. CONTINGENCY PLAN

II.M.1. The Permittee shall immediately carry out the provisions of Attachment 7 and follow the emergency procedures described by UAC R315-264-56. whenever there is a fire or explosion not authorized by this permit, or release of hazardous waste or hazardous waste constituents that threatens or could threaten human health or the environment. The Permittee shall comply with Condition I.U. and UAC R315-263-30 in reporting releases to the Director.

II.M.2. The Permittee shall comply with the requirements of UAC R315-264-53.

II.M.3. The Permittee shall use the assembly points designated in the Contingency Plan in Attachment 7.

II.M.4. A trained emergency coordinator shall be available at all times in case of an emergency, as required by UAC R315-264-55. The positions, titles, duties, and telephone numbers of all persons qualified to act as emergency coordinators shall be maintained in Attachment 7 (*Contingency Plan and Emergency Procedures*) of this Permit and supplied to the Director as required by UAC R315-264-52(d).

II.M.5. The Permittee shall review and immediately amend, if necessary, the Contingency Plan, as required by UAC R315-264-54 and as specified by UAC R315-264-54.

II.N. MANIFEST SYSTEM

II.N.1. The Permittee shall comply with the manifest requirements of UAC R315-264-71, UAC R315-264-72 and UAC R315-264-76.

II.N.2. If a waste load is refused for treatment at the facility and returned to the generator, such action shall be documented in the Operating Record.

II.N.3. Copies of all manifests received by the Permittee shall be included in the Operating Record.

II.O. RECORDKEEPING AND REPORTING

II.O.1. In addition to the recordkeeping and reporting requirements specified elsewhere in this permit, the Permittee shall comply with the following:

II.O.1.a. The Permittee shall maintain a written Operating Record at the facility in accordance with UAC R315-264-73.

- II.O.1.b. Within the Operating Record, the Permittee shall maintain, at the facility, a written waste minimization certificate in accordance with UAC R315-264-73.
- II.O.1.c. The Permittee shall maintain in the Operating Record copies of all spill reports for the TTU submitted to the Director in accordance with Condition I.U.
- II.O.2. The Permittee shall certify annually, by March 31 of each year, for the previous year ending December 31, that:
- II.O.2.a. The Permittee has a program in place to reduce the volume and toxicity of hazardous waste that it generates to the degree determined by the Permittee to be economically practicable and that the proposed method of treatment, storage, or disposal is the most practicable method currently available to the Permittee that minimizes the present and future threat to human health and the environment.
- II.O.2.b. The OB and OD treatment is the only practicable method or combination of methods currently available to minimize the present and future threat to human health or the environment. A report with an evaluation shall be presented that develops a list and analysis of viable alternatives for each waste stream treated at the TTU according to technical feasibility, economic feasibility, impact to employee health and safety and whether the alternative will reduce releases and discharges. Alternatives that are not viable shall be identified with the rationale for the rejection. Where practicable alternatives are identified, the report shall detail efforts taken with the Joint Munitions Command (JMC) to implement alternatives or divert waste towards alternatives with projected timelines for accomplishment of steps necessary for implementation.
- II.O.2.c. The Permittee has a program in place to investigate available technologies, other than the OB and OD of energetic wastes, to reduce the volume and toxicity of released treatment residues and discharges. Progress made by the program shall be reported annually as detailed in Condition II.O.2.b. The Permittee shall adhere to all current and new rules promulgated under UAC R315 regarding the treatment of energetic wastes.
- II.O.3. The Permittee shall maintain a copy of the certifications required in Condition II.O.2 in the Operating Record and sign each certification in accordance with UAC R315-262-41(a)(8).
- II.O.4. The Permittee shall comply with the biennial report requirements of UAC R315-264-75, by March 1 of each even-numbered reporting year. The report shall include wastes generated, treated, and stored at the Permittee's facility during the previous odd-numbered year as required by Condition I.EE., except as specified by the Director.

- II.O.5. The Permittee shall submit additional reports to the Director in accordance with UAC R315-264-77.
- II.O.6. All reports, notifications, applications, or other materials required to be submitted to the Director shall be submitted to the address shown in permit condition I.Z of this permit.

II.P. CLOSURE AND POST-CLOSURE

- II.P.1. The Permittee shall close the facility as required by UAC R315-264-110 and in accordance with the *Closure and Post-Closure Plan* (Attachment 8).
- II.P.2. For all HWMUs, any deviation from the Closure Plan necessary to accommodate proper closure shall be proposed to and approved by the Director prior to implementation. Such changes may require modification of the permit pursuant to UAC R315-124-5. The changes shall also be described in narrative form with the closure certification statements. Within 60 days after completion of closure of the HWMU, the Permittee shall submit the certification statements and narrative report to the Director.
- II.P.3. The Permittee shall amend the Closure Plan in accordance with UAC R315-264-112 whenever necessary, or when required to do so by the Director.
- II.P.4. The Permittee shall notify the Director in writing of partial or final closure of any HWMU at the Facility in accordance with UAC R315-264-110. The Permittee shall review the Closure Plan contained in Attachment 8 before commencing partial or final closure and shall certify to the Director that the Closure Plan is accurate and applicable to the hazardous waste management unit undergoing closure. If the Closure Plan requires modification, the plan shall be modified pursuant to UAC R315-124-5 and R315-270-42.
- II.P.5. After receiving the final volume of hazardous waste, the Permittee shall treat or remove from the unit all hazardous waste and complete closure activities in accordance with the schedules specified in Attachment 8.
- II.P.6. The Permittee shall decontaminate or dispose of all facility equipment, structures, soil, and rinsate as required by UAC R315-264-114 and Attachment 8. Facility equipment, structures, and soil which have not been decontaminated shall be managed only at a permitted hazardous waste treatment, storage, or disposal facility.
- II.P.7. The Permittee shall certify that the facility has been closed as specified in Attachment 8 and as required by UAC R315-264-115 and shall provide a certification by an independent qualified Utah-licensed professional engineer practicing within the scope of their employment, education, and training.

- II.P.8. In the event that any HWMU cannot be closed by removing hazardous waste and hazardous waste constituents from contaminated soil and any contaminated groundwater, as specified in the Closure Plan in Attachment 8, the Permittee shall either modify the permit in accordance with UAC R315-270-42 to provide for closure of the unit as a landfill in accordance with UAC R315-264-112 or provide for closure of the unit as a Solid Waste Management Unit (SWMU) in accordance with Condition IV.J. If a HWMU or a partial HWMU is closed as a landfill, the Permittee shall maintain post-closure care and monitoring as required by UAC R315-264-117 and in accordance with a Post-Closure Plan.
- II.P.9. If contamination is left in place at the time of closure, the Permittee shall prepare a survey plat indicating the location of the contamination. The survey plat shall be submitted with the certification of closure of each hazardous waste disposal unit in accordance with UAC R315-264-116.
- II.P.10. The following conditions apply to closure of the HWMU(s) identified in Module III, in addition to any closure requirements described elsewhere in this permit:
- II.P.10.a. Washwaters resulting from decontamination of facility structures and equipment at the time of closure will be sampled and managed in accordance with the Closure Plan in Attachment 8. Analysis of the washwaters shall be conducted in accordance with a Waste Analysis Plan submitted for approval by the Director at the time of notification of closure.
- II.P.10.b. The Permittee shall collect and analyze background soil samples prior to commencing closure. A Background Soil Sample Plan shall be submitted to the Director for review and approval. The Permittee shall submit the results of analysis and a statistical evaluation of the results in a report for approval by the Director within 180 calendar days of approval of the Background Soil Sample Plan. The permit shall be modified in accordance with UAC R315-270-41 to add the approved report to Attachment 8.
- II.P.10.c. Prior to closure, the Permittee shall review the Operating Record for records of spills at the TTU and shall visually inspect the TTU for signs of contamination such as soil staining. The Permittee shall propose a list of additional sampling parameters, soil sampling locations and clean-up criteria for approval by the Director to ensure that the hazardous wastes and hazardous constituents documented in the spill reports and visual inspections are accounted for in the Closure Plan.
- II.P.11. The Permittee shall submit, prior to closure, a Post-Closure Monitoring Plan for the TTU to be implemented should contamination be left in place at a HWMU or a partial HWMU.

II.Q. FINANCIAL ASSURANCE

II.Q.1. As a Federal government entity, the UTTR is exempt from the financial requirements of UAC R315-264-140.

II.R. INCAPACITY OF OWNERS OR OPERATORS, GUARANTORS, OR FINANCIAL INSTITUTIONS

II.R.1 States and the Federal Government are exempt from the financial requirements of UAC R315-264-140.

II.S. FINANCIAL ASSURANCE FOR CLOSURE/POST-CLOSURE

II.S.1 States and the Federal Government are exempt from the financial requirements of UAC R315-264-140. However, the Permittee's failure to request or obtain appropriate monies for its budget to complete all closure activities and any post-closure activities shall not be a defense against a finding of non-compliance by the Director.

II.T. FINANCIAL LIABILITY REQUIREMENTS

II.T.1 States and the Federal Government are exempt from the financial requirements of UAC R315-264-140.