

Spill Response
Call 911 for all spills to the environment (water, soil, drains)

- R**emove the source of the spill
- E**nvelop spilled material on ground
- A**bsorb spilled material; clean up soil
- C**ontainerize used absorbent & soil
- T**ransmit a report of the spill

DPW-ENRD

FORT NOVOSEL
ENVIRONMENTAL AND
NATURAL RESOURCES
DIVISION

**ENVIRONMENTAL
OFFICER
MANUAL**



Directorate of Public Works
Environmental and Natural Resources
Division
Bldg. 1121, Fort Novosel, AL 36362

www.fortnovosel-env.com



April 2024

**FORT NOVOSEL ENVIRONMENTAL AND
NATURAL RESOURCES DIVISION
MISSION STATEMENT**

In order to sustain the U.S. Army Aviation Center of Excellence (USAACE) and Fort Novosel's training, readiness, and quality of life needs, we will provide the guidance, actions, and customer assistance necessary to comply with all environmental laws and regulations, prevent pollution where possible, protect and conserve vital natural resources, and continually improve our operations.

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1.0 INTRODUCTION

In order to accomplish the Fort Novosel Environmental Mission, it is necessary to have a point of contact within each organization to provide the necessary guidance and oversight for operations that affect the environment. Army Regulation (AR) 200-1 requires all Army activities to appoint Environmental Officers (EOs) at the organizational, company or shop level. This policy is necessary to ensure compliance with the many federal and state environmental regulations.

An EO is a person within an organization appointed to ensure that environmental compliance requirements are met, as well as to ensure that no other environmental show-stoppers exist that may trip up the mission down the road. The EO also coordinates with the Directorate of Public Works (DPW) Environmental and Natural Resources Division (ENRD) to clarify requirements or for assistance.

All organizations on Fort Novosel must formally appoint an EO using USAACE Form 2729, *Environmental Officer Appointment Memo*, within 90 days of being assigned environmental duties.

This EO manual is designed as a quick reference for common questions or concerns. All environmental forms, policies and updated information on environmental programs are contained on the Sustainable Fort Novosel website.

<http://www.fortnovosel-env.com>

Fort Novosel soldiers, civilians and facilities must be compliant with environmental regulations at all times. The United States Environmental Protection Agency (EPA) and the Alabama Department of Environmental Management (ADEM) regulate Fort Novosel. The installation is subject to no-notice inspections from both regulatory agencies at all times. Organizations with areas that have deficiencies or are out of compliance with state or federal regulations are subject to receiving a Notice of Violation (NOV) and possible fines. Fines can be as much as \$87,855 per violation, per day the violation has existed. The organization causing the violation is responsible for paying environmental compliance fines.

PROGRAM AREAS	POC NAME	CONTACT INFO
<ul style="list-style-type: none"> Chief, Environmental and Natural Resources Division 	Melissa Lowlavar	334-255-1659 melissa.g.lowlavar3.civ@army.mil
<ul style="list-style-type: none"> NEPA Noise 	Susan Cowart	334-255-1652 susan.m.cowart.civ@army.mil
<ul style="list-style-type: none"> Lead-Based Paint Asbestos Spills SPCC 	Samuel Lynon	334-255-1656 samuel.a.lynon.civ@army.mil
<ul style="list-style-type: none"> Hazardous Waste Hazardous Materials P2 (Pollution Prevention) 		
<ul style="list-style-type: none"> Restoration PFAS Site Investigation 	Julie Majors	334-255-1657 julie.p.majors.civ@army.mil
<ul style="list-style-type: none"> Storm Water Waste Water Drinking Water Compliance Inspections EPAS 	Allison Marshall	334-255-1658 allison.t.marshall.civ@army.mil
<ul style="list-style-type: none"> Recycling Solid Waste Cultural Resources Pest Management Scrap Tires Used Oil/Fuel Pickups 	Brent Waters	334-255-2080 brent.waters3.civ@army.mil
<ul style="list-style-type: none"> Air Quality/Permitting Ozone Depleting Sub (ODS) Training (EO, Environmental Construction Management) 	Mackenzie Hall (KGS/Trinity)	334-255-0484 mackenzie.b.hall2.ctr@army.mil
<ul style="list-style-type: none"> Training (EO, SPCC, HWCAA, HWSAA) Compliance Inspection Support 	Travis Farmer (KGS/Trinity)	334-255-0487 travis.a.farmer5.ctr@army.mil
<ul style="list-style-type: none"> Chief, Natural Resources 	Marty Daniel	334-255-9363 marty.b.daniel.civ@army.mil
<ul style="list-style-type: none"> Fish & Wildlife Biologist 	Danny Spillers	334-255-2416 daniel.m.spillers.civ@army.mil
<ul style="list-style-type: none"> Forester 	James Jennings	334-255-1661 james.w.jennings14.civ@army.mil
<ul style="list-style-type: none"> Energy Conservation 	Alana Klosky	334-255-1368 alana.b.klosky.civ@army.mil
<ul style="list-style-type: none"> Chief, DPTMS Training Division 	Mark Buxton	334-255-4837 mark.w.buxton.civ@army.mil
<ul style="list-style-type: none"> Hazardous Materials Control Center (HMCC) 		334-598-1037
<ul style="list-style-type: none"> Recycling Center (Bldg. 9322) 		334-255-0468 / 334-498-4050

FIRE DEPT CRASH PHONE NUMBERS

Station	Phone Number
Allen	255-3027
Brown	255-9200
Ech	255-4374
Goldberg	255-3209
Hatch	255-2641
Highbluff	255-3182
Hooper	255-9172
Hunt	255-4868 / 255-4869
Louisville	Closed
Lucas	255-9487
Molinelli	255-4846 / 255-4097
Skelly	255-3594
Stinson	255-1232
Tabernacle	255-4343
Tac Runkle	255-9208
Toth	255-0791
Cairns	255-8375 / 255-8487
Hanchey	255-5093 / 255-5065
Knox	255-1290 / 255-1538
Lowe	255-4075 / 255-4656
Shell	255-4002 / 255-4185
Station #1	255-2217 / 255-1788
FD Training	255-1367 / 255-1566
E911	255-0248 / 255-0249
Flat Iron	255-8535
FD Supply	255-3537

The Fort Novosel DPW-ENRD Office is located in Building 1121 on Dilly Branch Road, near the Daleville gate and the Aviation Museum. If coming into post from the Daleville gate, you will be on Mayfield Avenue. If coming in from the Ozark gate or Enterprise gate, you will be on Andrews Road. Turn on Nighthawk Street from either Andrews Road or Mayfield Avenue. Once on Nighthawk Street, follow it and *bear right* when the road forks which becomes Dilly Branch Road. Follow the road a short distance around a 90 degree curve, and proceed straight until the road ends. Take a left at the stop sign past Building 1120, which has a tall flag pole. We are directly behind Building 1120. You may park in the parking lot adjacent to Building 1121 or anywhere that does not block a loading dock, fire hydrant, dumpster or on grass.



2.0 EO RESPONSIBILITIES

1. Attend Environmental Officer Team Meetings as required
2. Check Sustainable Fort Novosel website for updates and to ensure most recent versions of all documents are being used
3. Ensure compliance with environmental requirements
 - Ensure inspections are conducted (90-HWCAA, HWSAA, SPCC Plan Containers, and Washracks) using checklists from website
 - Coordinate corrective actions and response to DPW-ENRD for all inspection findings on USAACE Form 2742, *Quarterly Inspection Corrective Actions*
4. Ensure environmental training is completed for all personnel
 - At a minimum, all personnel should have job-specific SOP training and DPW-ENRD training (as applicable)
5. Ensure proper reporting and record keeping
 - Documentation is key to proving compliance with regulatory requirements
 - Create a binder using ENV-EM001: Environmental Binders, as a guide

BOTTOM LINE: recognize when assistance from DPW-ENRD is needed and know who to contact (see inside back cover of this manual for POCs and contact information).

ACRONYMS – continued

LBP	Lead Based Paint
LRC	Logistics Readiness Center
MSDS	Material Safety Data Sheets
ODS	Ozone Depleting Substances
OSHA	Occupation Safety and Health Administration
NEPA	National Environmental Policy Act
NOV	Notice of Violation
NPDES	National Pollutant Discharge Elimination System
P2	Pollution Prevention
RCRA	Resource Conservation and Recovery Act
REC	Record of Environmental Consideration
SARA	Superfund Amendments and Reauthorization Act
SDS	Safety Data Sheet
SOP	Standard Operating Procedures
SPCC	Spill Prevention, Control, and Countermeasures
SWPPP	Stormwater Pollution Prevention Plan
SVOC	Semi-Volatile Organic Compound
USAACE	United States Army Aviation Center of Excellence
UW	Universal Waste
VOC	Volatile Organic Compound

ACRONYMS

ADEM	Alabama Department of Environmental Management
AEC	Army Environmental Command
AR	Army Regulation
BEM	Building Energy Monitor
BMP	Best Management Practice
CCR	Consumer Confidence Report
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
CFR	Code of Federal Regulations
CBMPP	Construction Best Management Practices Plan
CX	Categorical Exclusion
DERP	Defense Environmental Restoration Program
DLADS	Defense Logistics Agency Disposition Service
DPW	Directorate of Public Works
EA	Environmental Assessment
EIS	Environmental Impact Statement
ENRD	Environmental and Natural Resources Division
EO	Environmental Officer
EPA	Environmental Protection Agency
EPACT	Energy Policy Act
EPAS	Environmental Performance Assessment System
EESOH-MIS	Enterprise Environmental, Safety & Occupational Health-Management Information System
HM	Hazardous Materials
HMCC	Hazardous Materials Control Center
HMMP	Hazardous Materials Management Program
HMI	Hazardous Material Inventory
HW	Hazardous Waste
90-HWCAA	Less than 90-Day Hazardous Waste Central Accumulation Area
HWMP	Hazardous Waste Management Plan
HWSAA	Hazardous Waste Satellite Accumulation Area
IAP	Installation Action Plan
INRMP	Integrated Natural Resources Management Plan
IPM	Integrated Pest Management
IRP	Installation Restoration Program
ISCP	Installation Spill Contingency Plan

3.0 EO RECORDKEEPING

ENV-EM001: Environmental Binders, contains guidance for identifying required documentation, including (not all items will be applicable for all organizations):

- USAACE Form 2729, *Environmental Officer Appointment Memo*
- USAACE Form 2719, *Site Specific Spill Plan*
- Copies of any NEPA documents (i.e., USAACE Form 251, *Record of Environmental Consideration*)
- Training Records
 - Environmental Officer Training certificates
 - SPCC Training certificates for oil handling personnel
 - Hazardous Waste and Hazardous Material training records
 - Hazardous Waste Satellite Accumulation Area Manager training certificates
 - USAACE Form 2735, *Hazardous Waste Job Description and Training Record*, or equivalent
 - 90 Day Hazardous Waste Central Accumulation Area Manager training certificate
 - Defense Hazardous/Waste Handling Course
- List of equipment requiring calibration and copies of calibration records
- Inspection Records (as applicable)
 - USAACE Form 2711, *SPCC Plan Container Inspection Checklist*, & organization's container inventory
 - USAACE Form 2712, *Washrack Inspection Checklist*
 - USAACE Form 2725, *HWSAA Inspection Checklist*
 - USAACE Form 2726, *90-HWCAA Inspection Log*
- USAACE Form 2716, *Secondary Containment Draining Activity Log*
- USAACE Form 2733, *HWSAA and 90-HWCAA Manager Appointment Memo*
- Stormwater construction permit notices of intent and termination

4.0 ENVIRONMENTAL INSPECTIONS

4.1 DPW-ENRD COMPLIANCE INSPECTIONS

Internal compliance inspections are conducted by DPW-ENRD personnel. Internal compliance inspections occur **QUARTERLY** and are **UNANNOUNCED**. Inspectors look for best management practice (BMP) implementation that will prevent adverse environmental impacts. The inspectors use USAACE Form 2717, *Environmental Compliance Inspection Checklist* to assess compliance.

4.2 ORGANIZATION-LEVEL INSPECTIONS

The following inspections should be completed by applicable organizations:

1. USAACE Form 2711, *SPCC Plan Container Inspection Checklist*: completed weekly for used oil containers, monthly for all other oil containers 55-gal or larger; submitted to DPW-ENRD monthly
2. USAACE Form 2712, *Washrack Inspection Checklist*: completed weekly for all washracks
3. USAACE Form 2725, *HWSAA Inspection Checklist*: completed weekly for all HWSAAs
4. USAACE Form 2726, *90-HWCAA Inspection Log*: completed weekly or as waste is added to the 90-HWCAA

4.3 EXTERNAL COMPLIANCE INSPECTIONS

External Compliance Inspections are conducted by ADEM or by the EPA. If an ADEM or EPA inspector comes to the facility, immediately notify your supervisor. If the inspector is not escorted by personnel from DPW-ENRD, notify DPW-ENRD as well.

During an external inspection, the person assigned to escort the inspectors should follow these guidelines:

- Help inspectors locate the activity or area to be inspected;
- Help inspectors make contact with the EO; and

FORMS - continued

USAACE Form 2742	<i>Quarterly Inspection Corrective Actions</i>
USAACE Form 2745	<i>Stormwater Outfall Inspection Checklist</i>
USAACE Form 2746	<i>pH Meter Calibration Record</i>
USAACE Form 2747	<i>Volunteer Feral Pig Trapping Agreement Permit</i>
Ft Novosel Form 128	<i>Investigation of Noise/Damage Complaint</i>
Ft Novosel Form 610	<i>Noise/Damage Complaints Log</i>

FORMS

USAACE Form 251	<i>Record of Environmental Consideration</i>
USAACE Form 2705	<i>Internal Audit Findings Form</i>
USAACE Form 2711	<i>SPCC Container Inspection Checklist</i>
USAACE Form 2712	Washrack Inspection Checklist
USAACE Form 2716	<i>Secondary Containment Draining Activity Log</i>
USAACE Form 2717	<i>Environmental Compliance Inspection Checklist</i>
USAACE Form 2718	<i>Spill Notification Form</i>
USAACE Form 2719	<i>Site Specific Spill Plan</i>
USAACE Form 2720	<i>Debris Recovery Plan and Statement</i>
USAACE Form 2721	<i>Soil Stockpiling and Borrow Pit Use Agreement</i>
USAACE Form 2725	<i>HWSAA Inspection Checklist</i>
USAACE Form 2726	<i>90-HWCAA Inspection Log</i>
USAACE Form 2727	<i>Emergency Release Notification (Follow Up)</i>
USAACE Form 2728	<i>STI SP001 Annual AST Inspection</i>
USAACE Form 2729	<i>Environmental Officer Appointment Memo</i>
USAACE Form 2730	<i>HM Authorization Request</i>
USAACE Form 2733	<i>HWSAA and HWCAA Manager Appointment Memo</i>
USAACE Form 2735	<i>Job Description and Training Form</i>
USAACE Form 2736	<i>Waste Shipment Record</i>
USAACE Form 2737	<i>Asbestos Physical Assessment</i>
USAACE Form 2738	<i>Asbestos Abatement Compliance Checklist</i>
USAACE Form 2739	<i>Asbestos Abatement Work Plan</i>
USAACE Form 2740	<i>Pest Management Maintenance Record</i>

- Document inspector questions that are unanswered during the facility on-site inspection; obtain answers to these questions and provide to inspectors to ensure full understanding.

4.4 ENVIRONMENTAL PERFORMANCE ASSESSMENT SYSTEM (EPAS)

EPAS assists with attaining, sustaining, and monitoring compliance with federal, state, and local environmental laws and regulations, as well as DoD and Army compliance and performance requirements. The purpose is to:

- Identify non-compliance with environmental regulations;
- Provide suggestions for both immediate and long-term corrective actions; and
- Indicate resources needed for implementation.

External EPAS is conducted every three to five years by personnel from the Army Environmental Command (AEC). The installation is required to conduct an internal EPAS annually. The internal EPAS usually occurs in the first quarter annually and is conducted by personnel in DPW-ENRD with assistance from other organizations as necessary. In order to help prepare for internal and external EPAS audits:

- Implement environmental compliance requirements as part of daily operations;
- Maintain all required documentation (i.e., Environmental Binder);
- Ensure assessors have access to all requested environmental documents; and
- Ensure assessors have access to required areas within organization's facilities (i.e. locked storage areas).

5.0 SPILL PREVENTION AND RESPONSE

5.1 PLANS

Fort Novosel has a Spill Prevention, Control, and Countermeasures (SPCC) Plan that addresses prevention measures that are in place for oil storage containers 55-gallons or larger. This plan complies with the requirements in 40 CFR 112 for Oil Pollution Prevention.

The Installation Spill Contingency Plan (ISCP) addresses measures to be taken in the event of a spill or release of oils and other hazardous substances. It is a statement of command policy and intent and is a working document for personnel responsible for oil storage/transfer or handling of hazardous materials/wastes.

All organizations that store or use hazardous materials, hazardous wastes, and/or oil products of any kind are required to develop a Site Specific Spill Plan using USAACE Form 2719. The plan must be updated annually. A hard copy of the first page must be posted where materials/wastes are stored, and the remainder of the plan must be stored in an easily accessible area.

5.2 TRAINING

At least once per year, all organizations (including contractors) must provide training for all employees who handle or use hazardous materials (HM), hazardous waste (HW), and/or oil/fuel of any type in quantities equal to or greater than 1 quart at a time (does not include refueling a ground vehicle at a fuel pump). New employees must not perform any operations involving HM, HW, or oil/fuel without direct supervision until they receive training.

Additional training information is located on the Sustainable Fort Novosel website at fortnovosel-env.com.

ENVIRONMENTAL DOCUMENTS

PROCEDURES

ENV-P001	Writing Environmental Documents
ENV-P002	Document Control
ENV-P003	Internal Auditing

WORK INSTRUCTIONS

ENV-AE002	Aerospace NESHAP Coatings Operations Inspection
ENV-AE003	Ozone Depleting Chemical Compliance Manager Policy
ENV-AS001	Asbestos Containing Material Identification
ENV-AS002	Asbestos Abatement Procedures
ENV-CR001	Cultural Resources Identification
ENV-EM001	Environmental Binders
ENV-NE001	NEPA Program
ENV-SW001	Waste Turn-In Procedure
ENV-SW002	Waste Battery Management
ENV-SW003	Used Lamps Management
ENV-SW007	Management of Used Oil & Fuel Filters
ENV-SW008	Used Cooking Oil Management
ENV-SW010	Contractor Hazardous Waste Management
ENV-SW011	Recycling Program
ENV-SW013	Used Tire & Scrap Tire Management
ENV-TA001	SPCC Container Inspection Program
ENV-WA001	Stormwater Construction Inspection Program
ENV-WA002	Soil Stockpiling and Borrow Pit Procedure
ENV-WA004	Washrack and OWS Operation and Maintenance
ENV-WA005	Spill Response

22.0 HISTORICAL/ARCHEOLOGICAL RESOURCES

Many Army installations and facilities are rich in historical resources such as prehistoric or historic archeological sites, historic buildings, and cemeteries. These places represent a clear link to our past and are non-renewable resources that enhance our lives. Significant historic and archeological resources must be identified and evaluated, and a process developed to ensure our heritage is maintained.

Section 110 of the National Historic Preservation Act (NHPA) of 1966 requires federal agencies to develop a program to locate, identify, and evaluate historic sites on federal lands, and to nominate these sites for the National Register. In addition, Section 106 of the NHPA requires that all federal land managers must consider the effect of federal undertakings upon historic properties. The following legislation also requires federal agencies to account for historical resources:

- American Indian Religious Freedom Act (1978);
- Archaeological Resources Protection Act (1979); and
- Native American Graves Protection and Repatriation Act (1990).

Fort Novosel meets the above regulatory requirements by adhering to AR 200-1, and through the use of a Cultural Resources Management Plan which is updated periodically. DPW-ENRD is responsible for management of the historical and archeological resources on the installation.

Removal of archeological artifacts (arrowheads, points, pottery chards) from Federally owned Army property is strictly prohibited.

5.3 INSPECTIONS

Inspections are required for all oil-filled containers (including cooking oil) that are 55-gallons or larger. Inspections should be conducted weekly for all used oil containers and monthly for all other containers using USAACE Form 2711, *SPCC Plan Container Inspection Checklist*. Submit copies to DPW-ENRD monthly.

5.4 SPILL RESPONSE PROCEDURES

Anyone discovering a spill or release of oil or hazardous substances of any size to water, soil, or stormwater drains must immediately report the incident to the Fire Department (call 911 - or appropriate crash number from list at back of manual). Also notify 911 if the spill exceeds your capability to clean it up or if an unsafe condition exists. If safe to act, take the following steps in the event of a spill include:

REMOVE the source of the spill

ENVELOP spilled material on the ground

ABSORB spilled material; clean up soil

CONTAINERIZE used absorbent and contaminated soil

TRANSMIT a report of the spill

As part of the existing notification procedures, the Fire Department will always notify DPW-ENRD. No additional notification is required. When the Fire Department has determined that no further threat to life or property exists, DPW-ENRD will serve as the on-scene coordinator and will determine if the spill is reportable to others as required by the ISCP. **Organizations that cause spills are required to clean up any spilled material.** Cleanup assistance may be provided by the support services contractor if necessary. The organization responsible for the spill will be billed for any cleanup expenses.

Documentation of spills to the ground or water is to be provided to the DPW-ENRD within 24-hours of the incident.

6.0 POLLUTION PREVENTION (P2)

The P2 philosophy operates in the following manner:

- First choice: Prevent or reduce pollution at the source when feasible;
- Second choice: Recycle if pollution or waste cannot be prevented; and
- Third choice: Ensure proper handling, disposal, or treatment of pollution or waste if the above options are not feasible.

Operational personnel often have the best visibility of potential process changes that could result in P2 benefits. DPW-ENRD can help with analysis of the projects and potentially help find funding for implementation. Contact DPW-ENRD with any ideas that could result in:

- Energy savings;
- Water conservation or reuse;
- Reduction in waste generation;
- Substitution of a less hazardous material; and/or
- Increased recycling.

- Remedial Investigation (RI)/Feasibility Study (FS). The RI is a detailed study that includes soil and water sampling to determine the extent of contamination. It also includes a health assessment which seeks to estimate risks to human health and the environment as a result of the contamination. The purpose of the FS is to identify alternatives for remediation or cleanup of the site. After a public comment period, the proposed plan is recorded in a document called a Record of Decision (ROD);
- Remedial Action (RA) and Interim Response Action (IRA). RA is the final remedy taken to eliminate the environmental contamination such as removing waste or contaminants from a site or treating waste or contaminants on-site. IRA may be required or undertaken over the short term to address the contamination before the complex, full-fledged RA may begin.

If investigation shows that significant contamination is present, a site may be placed on the National Priorities List (NPL). This is a docket in which both private and federal sites are prioritized for cleanup funding based on a release or the potential for release of contaminants. Fort Novosel (or any of its external sites) is not on the NPL.



21.0 INSTALLATION RESTORATION PROGRAM (IRP)

The Defense Environmental Restoration Program (DERP) was established in 1984 and is the comprehensive DOD program to identify and remediate past hazardous waste or contaminated sites at its installations and formerly occupied properties. The Installation Restoration Program (IRP) is the major element of the DERP and is the program through which DoD installations meet the requirements of Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), Superfund Amendments and Reauthorization Act (SARA), and Executive Order 12580.

The IRP is funded by a special appropriation called the Defense Environmental Restoration Account (DERA). The IRP differs from the other environmental compliance programs in that it focuses on past operations, generally prior to 1980.

DPW-ENRD manages Fort Novosel's IRP. Fort Novosel partners on its IRP issues regularly with the Corps of Engineers, investigative and remediation contractors, ADEM, and EPA. An Installation Action Plan (IAP) is reviewed and updated annually to reflect the sites and issues which require attention. The majority of the potential sites on Fort Novosel have already been screened, and no sites on Fort Novosel pose a risk to personnel.

Under the regulations, all investigative, assessment, and cleanup activities consist of these basic steps:

- Preliminary Assessment (PA)/Site Inspection (SI). This is the initial screening phase in which site visits, historical data searches about land use or past site activities, and often on-site sample collection takes place to determine potential problems;

7.0 SUSTAINABILITY

Compliance with the law alone is not enough to ensure that we will have the natural resources we will need in the future. Because of this, we must find a way to meet our needs today, without compromising the ability of future generations to meet theirs. This is called sustainability. It is not a new term to the Army in mission or battle scenarios, nor to corporations or municipalities that are thriving and profitable.

With sustainability, environmental compliance is not the point. The purpose of sustainability on Fort Novosel is having the resources in the future to train and deploy troops. Through the use of long-term strategic planning that fits into the installation's existing strategic planning process, sustainability can be achieved. If we do not have enough clean air, adequate water supplies, energy, landfill space, adequate infrastructure, or the money to pay for these things critical to our mission and quality of life, Fort Novosel and its mission will cease to exist.

The Fort Novosel Sustainability Program is evolving and has been integrated into the installation's strategic plan. The planning that is part of the Sustainability Program process will help ensure mission success and quality of life into the future.

Sustainability planning will address the Triple Bottom Line PLUS of mission, community, environment, and economic considerations in order to help Fort Novosel meet its needs into the future.

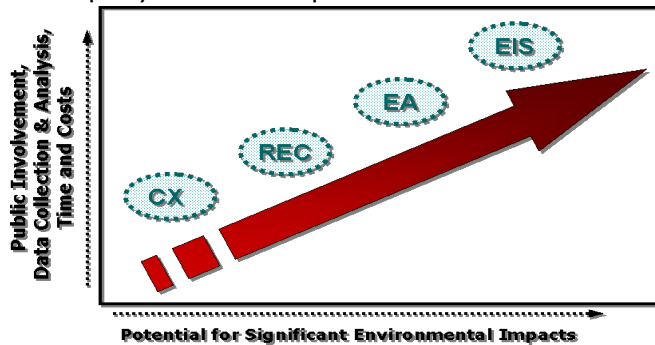


8.0 NATIONAL ENVIRONMENTAL POLICY ACT (NEPA)

NEPA establishes criteria for environmental protection. NEPA requires that federal agencies evaluate potential impacts early in the decision making process. Requirements of NEPA include consideration of environmental effects of proposed actions, evaluation of possible alternatives, and disclosure of these considerations to the public.

Each successive step in the NEPA review process takes additional time. The time required for the NEPA review should be considered when planning for any applicable projects. The four types of NEPA documentation are:

- Categorical Exclusion (CX);
- Record of Environmental Consideration (REC);
- Environmental Assessment (EA); and
- Environmental Impact Statement (EIS) - could take multiple years to complete.



Common activities which require NEPA documentation:

- Repair and maintenance projects;
- Construction Projects;
- Self Help Projects;
- Training Exercises;
- Research and Development; and
- Policy, Regulation, and Procedure Implementation.

20.0 NOISE

Due to the high training tempo and the associated impacts to noise from helicopter operations, environmental noise is a concern for quality of life and the potential impact to the surrounding communities. Operational noise has wide-reaching potential effects on a regular basis due to the frequent training missions that are conducted in such a large area of operation.

The Noise Management Team at Fort Novosel has implemented operational controls that are intended to address and prevent potential adverse impacts from the installation's training activities. These operational controls include the Fort Novosel Installation Operational Noise Management Plan (IONMP); Fort Novosel Regulation 95-2, Appendix J, *Fort Novosel Fly Neighborly and Noise Abatement Program*; and the Fly Neighborly Program Guide.

Personnel selecting, mixing or applying controlled or restricted-use pesticides must be DoD or State certified in the operational categories in which they are working. Operational categories include restricted use, controlled use, and uncontrolled use. Some pesticides are classified as able to be used in self-help applications. These self-help pesticides include:

- Insecticide, FIPRONIL, cockroach bait, regular size (COMBAT quick kill);
- Insecticide, FIPRONIL, cockroach bait, large size (COMBAT quick kill);
- Insecticide, N-ethyl perfluorooctane sulfonamide (ADVANCE DUAL CHOICE);
- Insecticide, MAXFORCE, fipronil, 0.01%, ant killer bait station;
- Insecticide, hydramethylnon (AMDRO fire ant bait), 1 lb. BT;
- Insecticide, d-trans allethrin and resmethrin, aerosol;
- Trap, roach, MR. STICKY OR SIMILAR;
- Trap, mouse, spring; and
- Swatter, fly.

Any pesticide used on the Installation must be listed on the Pesticide Use List (PUL) with approval from DPW-ENRD Pest Management Coordinator. The PUL can be located on the Sustainable Fort Novosel website.

When a new project is planned, the proponent of the action must complete the Fort Novosel NEPA screening procedure to ensure that environmental considerations are incorporated in the earliest phases of the project.

The screening procedure includes:

1. DA Form 4283 is submitted to the Business Operations and Integration Division (BOID) of DPW
2. DPW-BOID forwards the 4283 to DPW-ENRD
3. Environmental personnel screen the proposed project against the screening criteria and CXs listed in 32 CFR Part 651, Appendix B
4. If the project is encompassed by screening criteria and CXs as listed in 32 CFR Part 651, Appendix B, and does not require a REC, a CX is issued via memorandum
5. If a REC is required, DPW-ENRD completes the REC form with information provided by DPW-BOID
6. DPW-ENRD will determine if the REC is sufficient or if an EA or EIS is required

Proponent responsibilities:

- Proponent must consider the environment at the earliest stages;
- Description block of DA Form 4283 should be thoroughly completed with a detailed description of the project, including maps, drawings or analytical data for the proposed project.

Refer to ENV-NE001: NEPA Program, for more detailed information about the review process.

9.0 HAZARDOUS MATERIALS (HM) MANAGEMENT

9.1 HMMP

The Hazardous Materials Management Program (HMMP) at Fort Novosel was originally established in 1998. Fort Novosel Regulation 710-3 documents the details of the HMMP. The HMMP is intended to enhance readiness and improve sustainability through controlling and tracking the acquisition, use, handling, and disposition of HM. It is managed by the Logistics Readiness Center (LRC), and consists of the following management tools implemented together:

1. Hazardous Material Control Center (HMCC): Building 1315 on Fort Novosel;
2. Computer Tracking System and Labeling System: Enterprise Environmental Safety & Occupational Health —Management Information System (EESOH-MIS);
3. HM Senior Level Steering Committee: Comprised of organization senior leaders responsible for various aspects of HM management such as safety, logistics, environmental, fire safety and incident response, industrial hygiene/preventive medicine and contracting or procurement personnel;
4. HMMP Working Group: Comprised of organization working level representatives from key garrison areas, as well as representatives from all organizations who use hazardous materials. Determines HM policy and business practices and make recommendations to the HM Senior Level Steering Committee;
5. Control of Hazmat Purchases by Credit Card: One of the hardest things for Fort Novosel to track is HM purchased with government credit cards. Processing transactions through the HMCC helps capture necessary information for reporting purposes. (HMCC Form 7)

19.0 INTEGRATED PEST MANAGEMENT

Integrated pest management (IPM) is a planned program, incorporating continuous monitoring, education, recordkeeping, and communication. It is intended to prevent pests and disease vectors from causing unacceptable damage to operations, people, property, materiel, or the environment. IPM uses targeted, sustainable (effective, economical, environmentally sound) methods. Consider the following when choosing strategies for IPM:

- Least disruptive of natural controls;
- Least hazardous to human health;
- Least toxic to non-target organisms;
- Least damaging to the general environment;
- Most likely to permanently reduce pest population.
- Easiest to carry out effectively; and
- Most cost effective over the short and long term.

Types of control measures:

- Sanitation: Elimination of pest harborages and water and food sources;
- Mechanical control: Using barriers for exclusion; manually removing pests using hands, snares or vacuums; and setting traps, including sticky, electric, light, multiple-catch and snap types;
- Cultural control: Manipulation of the pest's environment to make it less favorable; and
- Chemical control: Last choice.

18.2 ASBESTOS

Do not disturb any building materials without DPW-ENRD review to ensure that no asbestos is present. Asbestos can be found in the following applications:

- Vinyl floor tile, linoleum, and mastic;
- Roofing materials;
- Ceiling tiles;
- Brake shoes;
- Adhesives;
- Insulation (pipe, equipment, duct, blown);
- Gaskets; and
- Pipes.



Health Issues (inhalation) associated with asbestos:

- Removal issues dictated by OSHA;
- Becomes a health issue when it degrades into microscopic fibers; and
- Generally not a problem unless friable.

Environmental Issues associated with asbestos include:

- Air Emissions: need to notify ADEM before working with/on asbestos; and
- Disposal: must be handled and disposed following ADEM regulations.

9.2 HMCC (BLDG. 1315)

HM must be managed closely to ensure proper use, storage, and disposal. The HMCC was implemented to help ensure accountability and oversight of the HM on Fort Novosel. The HMCC offers the following services:

- Provides local purchase support;
- SDS;
- Shelf life extensions;
- Free issue products; and
- Manage containers for disposal/recycling.



All HM must be procured through the HMCC to ensure accountability for the HM. Exceptions to this policy can be granted on a case-by-case basis due to mission requirements. Organizations should utilize USAACE Form 2730, *Hazardous Material Authorization Request*, to have HM added to their authorized use list (AUL).

9.3 CREDIT CARD POLICY FOR HM

Ref: FR Supplement to the Department of Army Government Purchase Card SOP (February 2003)

1. Credit card policy requires all personnel to contact the HMCC to inquire about product availability before making any HM purchases by credit card. Customers may be able to save money or procurement time if HMCC has the item in stock;
2. If the HMCC cannot immediately fill your requirements, they will either make the purchase for you or authorize you to use the government credit card. Certain circumstances affect this, so the best thing to do is contact the HMCC to discuss your situation and needs.

10.0 HAZARDOUS WASTE MANAGEMENT

Fort Novosel is considered a large quantity generator (i.e. generates greater than 1000 kg or 2,200 pounds per month) of hazardous waste, and submits a hazardous waste report each year to the state of Alabama and biennially to the EPA. Fort Novosel has its own unique EPA/State identification number for hazardous waste generation, storage, and shipping for disposal/recycling.

Cairns Army Airfield is not contiguous to the main Fort Novosel property and is a large quantity generator with its own unique EPA/State identification number. Shell Army Heliport is not contiguous to the main Fort Novosel property and is a small quantity generator with its own unique EPA Identification Number. The EPA ID numbers are:

Main Post: AL6210020776
 Cairns: AL9210090040
 Shell: AL2210090039

Fort Novosel operates a centralized 90-day hazardous waste central accumulation area (90-HWCAA), as well as four other 90-HWCAA around the installation and a 180-HWCAA at Shell. Fort Novosel has numerous hazardous waste satellite accumulation areas (HWSAA) and universal waste (UW) accumulation sites.

10.1 HW TRAINING

Specific hazardous waste training is required by federal, state, and Army regulations for individuals who are involved in any aspect of HW handling in his/her organization. 90-HWCAA managers require 24hr initial and 8hr refresher RCRA training and a 2hr DPW-ENRD 90-HWCAA Manager Course annually. HWSAA managers require the 2hr HWSAA Manager Course annually. This training is required for HWSAA managers that manage UW and HWSAA.

To enable employees to attend training more easily, DPW-ENRD arranges training courses several times a year at Fort Novosel. There is no cost to attend. Register for classes at least two weeks before the scheduled class on the Sustainable Fort Novosel website.

18.0 TOXIC SUBSTANCES

18.1 LEAD BASED PAINT (LBP)

LBP is defined as paint or other surface coatings that contain lead equal to or exceeding 1.0 milligram per square centimeter or 0.5 percent by weight or 5,000 parts per million (ppm) by weight. Health issues that result from inhalation or ingestion include:

1. Children – keep away from it; LBP may cause:
 - Damage to brain or nervous system;
 - Behavior and learning problems;
 - Slowed growth;
 - Hearing problems; and
 - Headaches.
2. Adults – do not disturb. If you must disturb, contact Industrial Hygiene for guidance. LBP may cause:
 - Difficulty during pregnancy;
 - Other reproductive problems;
 - High blood pressure;
 - Digestive problems;
 - Nerve disorders;
 - Memory and concentration problems; and
 - Muscle and joint pain.

When encountering LBP:

- Painted wood must either be sampled or assumed to be LBP and HW for disposal (sample analysis results for TCLP \geq 5ppm requires D008 waste code);
- Sample entire waste stream;
- LBP from family housing is household waste; and
- See DPW-ENRD for assistance in disposing of non-household LBP.

17.0 ENERGY CONSERVATION

Energy conservation saves valuable resources and money for Fort Novosel and the Army. By managing energy usage, we can cut our energy waste and redirect our energy use to increased comfort, productivity, and dollar savings. The Fort Novosel energy conservation program is designed to help the installation comply with Federal law, Presidential Executive Orders and Army mandates relating to energy management.



The Building Energy Monitor (BEM) program was established to help accomplish the goals of the energy conservation program. A commissioned officer (O1 or above), or equivalent civil service officer, is appointed within each level of command to serve a term of 12 months or more. The BEM should attend the BEM class within 60 days of appointment.

EO responsibilities for the energy conservation program include:

- Ensuring a BEM is assigned for every building/ area;
- Publishing/maintaining an Energy SOP with the BEM;
- Ensuring all buildings are inspected for potential energy issues on a monthly basis;
- Maintaining BEM continuity books; and
- Assisting with planning operations and activities to conserve energy and water.

The energy conservation program is managed by personnel in the Engineering Division of DPW.

ADEM requires HW refresher training annually. ***It is a violation of state law if you are handling HW in your organization and do not obtain your HW refresher training within 365 days of the last training.***

10.2 HW MANAGEMENT PROCESS

STEP 1: Identify waste

STEP 2: Accumulate waste in a HWSAA

STEP 3: Turn-in waste to 90-HWCAA

10.2.1 IDENTIFY HW

SOLID WASTE: Solid, liquid, semi-solid or contained gaseous material which is discarded, served its intended purpose, or is a manufacturing or mining by-product

HAZARDOUS WASTE: Solid waste which exhibits characteristics of hazardous waste or is listed in ADEM Administrative Code 335-14-2 / 40 CFR Part 261 Subpart D. Listed wastes are found on four lists:

- F - List: Non-specific sources (ADEM Admin Code 335-14-2-.04(2) / 40 CFR 261.31);
- K - List: Specific sources (ADEM Admin Code 335-14-2-.04(3) / 40 CFR 261.32);
- P - List: Pure or commercial grade formulations of certain specific unused chemicals that are acutely hazardous (ADEM Admin Code 335-14-2-.04(4)(e) / 40 CFR 261.33); and
- U - List: Pure or commercial grade formulations of certain specific unused chemicals (ADEM Admin Code 335-14-2-.04(4)(f) / 40 CFR 261.33).

Hazardous Waste Characteristics:

- Ignitability - Waste Code: D001 (ADEM Admin Code 335-14-2-.03(2) / 40 CFR 261.21)
Flashpoint <140 °F or oxidizer

- Corrosivity - Waste Code: D002 (ADEM Admin Code 335-14-2-.03(3) / 40 CFR 261.22)
Liquid with pH ≤ 2 (acid) or ≥ 12.5 (base)
- Reactivity - Waste Code: D003 (ADEM Admin Code 335-14-2-.03(4) / 40 CFR 261.23)
Reacts with water, explosive, cyanide bearing
- Toxicity - Waste Codes: D004-D043 (ADEM Admin Code 335-14-2-.03(5) / 40 CFR 261.24) -
See table on the next page

Personnel in DPW-ENRD will help you characterize your waste properly. The following list shows the wastes that are commonly generated at Fort Novosel. Contact DPW-ENRD if you have any additional questions.

- Absorbent Materials Contaminated with Cadmium, Chromium, and Lead;
- Petroleum Contaminated Products;
- Filters/Absorbent Materials Contaminated w/ Paint;
- Paint and Paint-Related Material;
- Blast Media;
- Clarus Parts Washer Liquid;
- Clarus Parts Washer Filters.
- Alodine Waste;
- Plating Shop Solids;
- Plating Solutions and Mop Water;
- Zyglo Rinsate/Developer;
- Cleaning Compounds (several types);
- Expired aviation Maintenance Products (adhesive, sealants, carbon remove, etc.); and
- Universal Waste (lamps, batteries, aerosols, etc.)

Timber harvesting is a much needed component of good forest management. Thinnings of various intensities are conducted each year to improve forest health, increase growth and yield of timber, and to improve areas for the purpose of military training. Clear-cuts, though not always aesthetically pleasing, are required in order to clear areas where "offsite" species have proliferated, insect and disease infestations have occurred, and other issues that have caused a failure of the species that naturally regenerated on the site or that were planted. Reforestation of each clear-cut is planned prior to the h

Throughout each year, timber stand improvement (TSI) is conducted to ensure that each stand of timber is maintained in a healthy status. TSI is conducted using both chemical and mechanical methods. Recently thinned areas in which herbaceous and woody stems have increased in abundance due to an increase in sunlight are targeted for the application of herbicide in order to promote the correct species and to limit unwanted vegetation. Prescribed fire is used extensively to control unwanted vegetation and to promote wildlife habitat.

Cogongrass is a non-native invasive grass that is present on Fort Novosel and is potentially devastating to wildlife populations and native vegetation. The majority of infestations occur along right of ways. The primary reason for its spread across Fort Novosel is due to equipment being used for mowing, roadwork, and for a host of other purposes. Approximately 10 acres of new infestations are identified and treated each year. The Fort Novosel forest management section is working to ensure all directorates who could come into contact with the plant are able to identify it. The areas are then treated and revegetated to ensure the spot is not susceptible to erosion. Kudzu occupies a large percentage of the forestage acreage on Fort Novosel. Kudzu infestations adjacent to right of ways are treated by forestry and other personnel each year.

In order to protect the installation’s natural resources, permission is required to disturb land or cut vegetation. A NEPA review is required prior to any change of vegetation. Contact Natural Resources Branch for requirements relating to land disturbances or vegetation removal.

The Fort Novosel Forestry Section is responsible for the stewardship and management of 58,000 contiguous acres of timberland, with an additional 4,000 acres of timberland at outlying airfields. The primary objective of the program is to ensure the forested landscape is managed in a sustainable manner that meets all ground-based military training requirements. Secondary objectives include: improved forest health, ecological biodiversity, improved recreational landscapes, improved wildlife habitat, improved aesthetics, and revenue generated from the sale of forest products.

Tools being used to meet the stated objectives are: prescribed fire, timber harvests, timber stand improvement, reforestation, and eradication of non-native invasive plant species (cogongrass and kudzu).

Prescribed fire is conducted on an average of 10,000 acres of timberland each year. Prior planning is conducted to ensure all contingencies are evaluated to ensure the safety of those involved, as well as the safety of the public and the Fort Novosel community. Objectives include:

- 1.Reduce hazardous fuels
- 2.Prepare sites for seeding and planting
- 3.Dispose of logging debris
- 4.Improve wildlife habitat
- 5.Manage competing vegetation
- 6.Control disease
- 7.Enhance appearance
- 8.Improve access for military training
- 9.Perpetuate fire-dependent species
- 10.Cycle nutrients
- 11.Manage endangered species

EPA WASTE CODE	CONTAMINANT	REGULATORY LEVEL (mg/l)
D004	ARSENIC	5.0
D005	BARIUM	100.0
D018	BENZENE	0.5
D006	CADMIUM	1.0
D019	CARBON TETRACHLORIDE	0.5
D020	CHLORDANE	0.03
D021	CHLOROBENZENE	100.0
D022	CHLOROFORM	6.0
D007	CHROMIUM	5.0
D023	O-CRESOL	200.0
D024	m-CRESOL	200.0
D025	p-CRESOL	200.0
D026	CRESOL	200.0
D016	2,4-D	10.0
D027	1,4-DICHLOROBENZENE	7.5
D028	1,2-DICHLOROETHANE	0.5
D029	1,1-DICHLOROETHYLENE	0.7
D030	2,4-DINITROTOLUENE	0.13
D012	ENDRIN	0.02
D031	HEPTACHLOR (and its epoxide)	0.008
D032	HEXACHLOROBENZENE	0.13
D033	HEXACHLOROBUTADIENE	0.5
D034	HEXACHLOROETHANE	3.0
D008	LEAD	5.0
D013	LINDANE	0.4
D009	MERCURY	0.2
D014	METHOXYCHLOR	10.0
D035	METHYL ETHYL KETONE	200.0
D036	NITROBENZENE	2.0
D037	PENTACHLOROPHENOL	100.0
D038	PYRIDINE	5.0
D010	SELENIUM	1.0
D011	SILVER	5.0
D039	TETRACHLOROETHYLENE	0.7
D015	TOXAPHENE	0.5
D040	TRICHLOROETHYLENE	0.5
D041	2,4,5-TRICHLOROPHENOL	400.0
D042	2,4,6-TRICHLOROPHENOL	2.0
D017	2,4,5-TP (Silvex)	1.0
D043	VINYL CHLORIDE	0.2

10.2.2 ACCUMULATE WASTE IN HWSAA

1. All containers must be kept closed at all times except when adding, removing, or consolidating waste; or when temporary venting of a container is necessary.
2. The HWSAA must be
 - At or near the point of generation, and
 - Under the control of the operator (i.e., to prevent unauthorized access and accidental releases).
3. Sign that says "Hazardous Waste Satellite Accumulation Area" posted at the designated HWSAA.
4. Maximum volume
 - 55 gallons of hazardous waste or
 - 1 quart of acutely hazardous waste.
 - Each waste stream is considered a separate HWSAA even if located in the same area. For example, a "Paint & Thinner Waste" HWSAA and a "Fuel Soaked Absorbents" HWSAA may be located next to each other, and each could accumulate a maximum of 55 gallons."
5. The HWSAA Only containers approved by DPW-ENRD may be used to accumulate hazardous waste.
6. Container Compatibility:
 - Containers must be compatible with the waste that is accumulated in them, and
 - Containers of incompatible materials must be segregated.



- Training Requirements Integration (TRI): optimization of land use by integrating mission requirements with the carrying capacity of the land.

10 October 2012 the U.S. Fish and Wildlife Services proposed to list the several species of mussels under the Endangered Species Act that have been observed at Fort Novosel. The Choctaw bean is a listed endangered species and the fuzzy pigtoe is a listed threatened species that have been observed on Fort Novosel property. Any activities affecting watersheds on the Installation must be reviewed for possible impacts to listed mussel species. This includes land disturbance, chemical use, low water crossings, roadwork, and any other activity with the potential to affect water quality or to constitute a barrier to mussel or fish travel within the waterway.



Additional species of concern include:

- *Bald Eagle*: protected under the Bald and Golden Eagle Protection Act.
- *Gopher Tortoise*: not listed as threatened in this part of its range but is a candidate species for listing and is protected by the state. The Army considers the gopher tortoise a SAR (Species at Risk) and has a Candidate Conservation Agreement with the FWS for proactive management. Do not disturb and avoid vehicular traffic near tortoise holes.
- *American Alligator*: previously endangered but recovered due to protection from the Endangered Species Act and implementation of management practices. This species continues to be protected due to resemblance to saltwater crocodile. Do not disturb.

16.0 NATURAL RESOURCES

At Fort Novosel, the DPW-ENRD Natural Resources Branch manages our land, forests, and wildlife using an Integrated Natural Resources Management Plan (INRMP) as required by the Sikes Act as amended in 1989 as well as AR 200-1. The INRMP is installation specific, and is the road map for performing the necessary actions associated with:

- Forest management;
- Fish and wildlife management;
- Land management (to include training lands, wetlands, and agricultural lands);
- Erosion control;
- Soil conservation; and
- Wetlands protection.



The Natural Resources Branch partners with several other offices to successfully manage and sustain the natural resources on Fort Novosel. Partners include the U.S. Fish and Wildlife Service and State of Alabama Department of Conservation and Natural Resources, both of which have agreed upon management procedures in the INRMP.

In order to help protect the training areas of the installation, the Natural Resources Branch works with the Integrated Training Area Management (ITAM) program. ITAM was designed as a comprehensive approach to land management, and includes four elements:

- Land Condition Trend Analysis (LCTA): inventory and monitoring of natural resources (including endangered species where applicable) to document conditions and assess the ability of the land to withstand military training and testing;
- Environmental Awareness: education of military and civilians to foster wise use of the land;
- Land Rehabilitation and Maintenance (LRAM): revegetation and erosion control to restore the land, and enhance testing/training realism; and

7. The HWSAA Container should be marked with the following:
 - The words "Hazardous Waste";
 - Contents of the container (i.e., adhesives);
 - Hazardous characteristics (i.e., ignitable, corrosive, reactive, and toxic);
 - EPA waste code (i.e., D001); and
 - EPA ID number.
8. All HWSAA must be located away from drains and sheltered from weather.
9. If the HWSAA is enclosed, provide adequate lighting and ventilation. If the HWSAA is not enclosed, it must be protected from direct sunlight and inclement weather.
10. Containers must be stored to avoid direct contact with foundation or flooring by using pallets or other suitable device to facilitate inspections.
11. Sufficient aisle space must maintained to allow for the unobstructed movement of personnel and fire protection, spill control, and decontamination equipment.
12. Spill equipment should be located within easy access of the HWSAA.
13. Containers must be in good condition: no rusting, dents, bulging, leaks, noticeable spills, or evidence of deterioration.
14. Secondary containment is required for any liquid wastes.
15. Properly ground metal containers storing highly flammable wastes.

16. Segregate incompatible waste streams:
 - Segregate reactive waste from ignitable waste
 - Segregate acids from caustics
 - Segregate corrosive waste from flammable waste
 - Segregate oxidizers from all other wastes
17. If containers have a funnel (securely attached and consistently used), the funnel must have a lid equipped with a seal (ball valve) and latching/locking mechanism and must be kept secured when waste is not being poured or added to the container.
18. Conduct weekly inspections (every 7 days) using USAACE Form 2725, *HWSAA Inspection Checklist*. Maintain inspection records at the HWSAA. DPW-ENRD will also perform quarterly compliance inspections that include each HWSAA.

10.2.3 TURN IN WASTE TO 90-HWCAA

1. Transfer hazardous waste to 90-HWCAA within 3 calendar days of meeting threshold of 55 gallons of hazardous waste or 1 quart of acutely hazardous waste.
2. When threshold is met,
 - Mark accumulation start date on container (date container was full); and
 - Contact DPW-ENRD for assistance.
3. Complete DD Form 1348-1A for turn-in of the hazardous waste to the 90-HWCAA.



15.3 SANITARY SEWER

Do not discharge anything into inside drains (to include floor drains) unless you are sure it is approved by DPW-ENRD. Unauthorized pollutants could damage or interfere with the wastewater treatment process. It could create safety problems if a HM with dangerous vapors builds up inside piping.

If an unexpected incident occurs during the handling of fuel or hazardous substances and any amount is discharged to the sanitary sewer, contact the Fire Department (call 911 or appropriate crash number - see list at back of manual). If a large quantity is discharged, call 255-9041/9042 as well.

15.4 WASHRACKS

Washracks are equipped with an oil-water separator (OWS) which captures oil and fuel residue from wash water and routes the water to a wastewater treatment plant. ENV-WA004: Washrack and Oil Water Separator Operations and Maintenance, outlines requirements for ensuring NPDES compliance while using washracks and OWS, including completing USAACE Form 2712, *Washrack Inspection Checklist*, weekly.

Approved washracks for vehicle washing are located at the Transportation Motorpool (TMP) on Dilly Branch Rd, ECS 151 at Knox, and National Guard UTES facility. Only aircraft may be washed on the washracks at the airfields.

Most of Fort Novosel's washracks have an overhead cover which minimizes the effects of rain water on contaminants that may be present on washrack areas. Do not use any type of soap or solvent on the washracks unless authorized by DPW-ENRD. Maintenance process wastewater must not be discharged through the washrack and/or sanitary sewer unless authorized by DPW-ENRD.

ADEM issued an industrial stormwater permit with seven separate, regulated discharge points. The permit requires annual sampling and monitoring one representative discharge point.

Stormwater BMPs for Operational Areas:

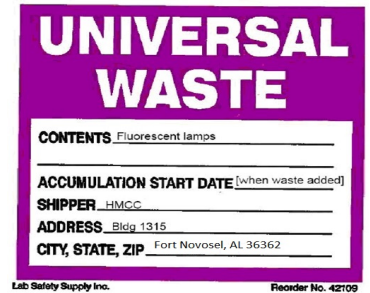
- Regularly monitor and inspect areas where vehicles, aircraft, or equipment are handled or stored to minimize fluid leaks and contaminant migration;
- Use drip pans or absorbents if vehicles, aircraft, or equipment are known to leak or could create a potential spill situation;
- Store hazardous substances inside secondary containment and under overhead cover;
- Monitor areas around used oil or fuel tanks for spillage and clean up as necessary;
- Clean away any leaves, limbs, trash, or other debris which may be clogging up storm drains. A clogged drain will not be able to drain water effectively;
- Have spill supplies nearby in the event of a spill, and know how to react if a spill occurs. A quick spill response action can often stop the spill before it migrates into drains or the environment; and
- Call 911 (or appropriate crash number - see list at back of manual) for all spills. The Fire Department will respond first and will contact DPW-ENRD as needed.

11.0 UNIVERSAL WASTE

The universal waste regulations found in 40 CFR 273 streamline collection requirements for certain hazardous wastes in the following categories:

- Batteries;
- Pesticides;
- Mercury-containing equipment and lamps;
- Aerosol

**All aerosols must be collected and turned in to the HMCC for proper evaluation and management. Users should collect aerosol cans not in use in a structurally sound and compatible container marked:
 "USED AEROSOL CANS" and
 "RETURN TO HMCC."



• Universal Waste Requirements:

1. Universal waste containers must be closed except when adding or removing waste.
2. Mark all containers with the following:
 - "UNIVERSAL WASTE";
 - Type of waste (i.e., Fluorescent Lamps); and
 - Date waste was **first** put into container.
3. Turn-in universal waste by **six months** of start date.
4. Use DD Form 1348-1A for universal waste turn-in.
 - Universal Waste batteries (e.g., Lithium, NiCd, Mercuric-Oxide, NickelMetal-Hydride (NiMH), Silver Oxide, Silver-Zinc, Zinc-Carbon, and Zinc Airbatteries) should be collected in DOT approved containers with a closing lid, and should be properly segregated to prevent short-circuiting during storage and transportation. Universal Waste batteries will be segregated by one of the following methods:

Coordinate turn-in of UW batteries in excess of one 5-gallon container with HMCC (334-598-1037).

- placing batteries in the original inner package;
- taping the positive end of the batteries;
- by using plastic "baggies" to separate individual batteries

12.0 NON-REGULATED WASTE

- Used Antifreeze: turn-in to 90-HWCAA
- Used Engine Oil: consolidate in used oil ASTs for recycling in accordance with SPCC Plan requirements
- Used Cooking Oil: consolidate in used cooking oil containers for recycling in accordance with SPCC Plan requirements
- Absorbents contaminated with non-hazardous wastes (i.e., engine oil): turn-in to 90-HWCAA with DD Form 1348-1A
- Lead Acid Batteries: When the one-for-one Exchange Program is not utilized, they should be collected for recycling/reclamation; must turn in to HMCC or the Recycling Center. HMCC must be used when in excess of 15 used Lead-Acid batteries.

Additional information about handling these special wastes can be found on the Sustainable Fort Novosel website.

Any disturbance of **one acre or more** requires a Construction Best Management Practice Plan (CBMPP) and a National Pollutant Discharge Elimination System (NPDES) permit issued by ADEM. The NEPA Screening Checklist will indicate the need to initiate this action, and DPW-ENRD will provide guidance. You must plan ahead so that a plan can be developed and permit received to not impact your project schedule.

Any disturbed areas must also be re-vegetated and meet ADEM’s definition of final stabilization from Part IV (T)(17) of the Construction General Permit (ALR100000).

For construction projects requiring concrete placement, concrete truck washout is also a stormwater concern and a prohibited discharge in accordance with construction and industrial stormwater permits. If washing of any part of a concrete truck must be done, it will be in a pit lined with plastic or a mobile device to be used for this purpose. Once water has evaporated, the solids will be disposed of in an ADEM approved landfill.

Discharge of stormwater from industrial or operational areas could contaminate surface waters, including locations such as:

- Motor pools (clean up spills, use drip pans);
- Hazardous materials storage (cover, good housekeeping); and
- Washracks (make sure water goes to washrack and that valve is positioned to discharge to sanitary sewer when washing vehicles).



15.0 WATER QUALITY & WASTEWATER

15.1 DRINKING WATER

The Fort Novosel drinking water system was privatized to American Water Enterprises (AWE) in 2004. AWE samples for lead and copper annually. All family housing and workplace areas are below action levels.

AWE samples drinking water for bacteriological and chlorine residual.

- Family housing: no problems have been found;
- Workplace: some chlorine residual problems in old lines, which are generally handled by flushing and phased in waterline replacement.

AWE samples at wellhead for volatile organic compounds (VOCs), semi-volatile organic compounds (SVOCs), pesticides, and inorganic contaminants. No problems have been found. The contract with AWE calls for total distribution system replacement which is ongoing. Preventive Medicine does bacteriological and chlorine residual sampling inside buildings at the request of the occupant.

To comply with ADEM and EPA regulations, AWE is required to issue the Consumer Confidence Report annually describing the quality of your drinking water by 1 July. The purpose of the report is to provide you an overview of the drinking water quality from the previous year. It includes details about where your water comes from and what it contains. The report is available on the Sustainable Fort Novosel Website under the Drinking Water tab.

15.2 STORMWATER MANAGEMENT

Any clearing of land or removal of ground cover (vegetation) must be considered for stormwater impact. Any disturbance (regardless of size) requires a stormwater management plan approved by the Stormwater Program Manager that includes best management practices (BMPs) such as silt fences and runoff control.

13.0 SOLID WASTE

Solid waste is generated in three areas at Fort Novosel:

1. Residential areas;
2. Training areas; and
3. Garrison areas.

13.1 RESIDENTIAL AREAS

Residential waste is any waste that is generated as a result of personal, household-type activities. Residential waste is exempt from some of the more stringent requirements for waste management. Best management practices should be implemented to reduce waste generated and to recycle items in the recycling program

Residential waste is generated in the following areas:

1. Military Family Housing – managed separately by Corvias – contact neighborhood office for additional details about specific requirements; and
2. Barracks – managed with waste from garrison areas.

13.2 TRAINING AREAS

Training waste is generated while completing training exercises. The following wastes associated with training have special management requirements. Contact DPW-ENRD for additional information on these wastes.

- MRE Heaters: individual unused or multiple used heaters may be disposed of with regular trash, but must be handled as HW for bulk disposal when unused.
- Range Items: any items removed from ranges are subject to the military munitions rule.
 - In general, do not remove items found on ranges;
 - Contact Range Operations for more information on management of these items.

13.3 GARRISON AREAS

Garrison waste is generated as part of the daily operations of Fort Novosel. This waste includes waste generated by all types of activities from maintenance to administrative areas.

The solid waste contractor collects waste from dumpsters and transports to a regional municipal landfill. After placing waste in dumpsters, always ensure that dumpster doors and lids are closed to protect contents from rain. For dumpster service, call the DPW Contract Management Division at 334-255-2998. Garrison waste must be carefully managed to ensure:

- Proper segregation and management of hazardous and special wastes;
- Implementation of waste minimization practices;
- Recycling to the maximum extent possible.

These items are prohibited from disposal in dumpsters:

- | | |
|-----------------------------------------------------------------|-----------------------------------------|
| • Hazardous waste | • Medical waste |
| • Hazardous materials (POL, fuel, solvent, etc.) | • Dirty rags |
| • Universal waste (batteries, aerosols, lamps, etc.) | • Oil/fuel soaked absorbents or filters |
| • Recyclable items (office paper, cardboard, scrap metal, etc.) | • NBC filters & detection kits |
| | • Tires |

13.4 CONSTRUCTION AND DEMOLITION (C&D) DEBRIS

All C&D debris should be taken to an ADEM-approved landfill for disposal. Contact DPW-ENRD for a list of ADEM approved landfills. Any items that can be recycled should be segregated and taken to a recycling facility. Quantities recycled, disposed, or reused should be reported monthly to DPW-ENRD for inclusion in the Solid Waste Annual Report.

Contractors should use USAACE Form 2720, *Debris Recovery Plan and Statement*, to document planned diversion of materials prior to project commencement and to report quantities actually diverted at the end of the project. This form & copies of weigh tickets should be turned in to DPW-ENRD within 30 days of project completion.

14.4 OZONE-DEPLETING SUBSTANCES

Ozone Depleting Substances (ODS) are any compounds that contribute to the depletion of the stratospheric ozone layer. ODS include:

- Chlorofluorocarbons (CFCs);
- Hydrochlorofluorocarbons (HCFCs);
- Halons;
- Methyl Bromide;
- Carbon Tetrachloride; and
- Methyl Chloroform.

ODS that may be encountered at Fort Novosel include:

- Class I ODS: R-11, R-12, R-502, and Halons;
- Class II ODS: R-22; and R123a.
- Non Ozone Depleting (NOD) Replacements for Class I and Class II ODS: R-134a, R-404a, R410a, R402b.

Equipment that commonly has ODS includes:

- Halon Fire Extinguishers;
- Refrigerators;
- Water Coolers;
- Air Conditioners: Window units; Building units; Motor vehicle units; Tactical equipment; and Chillers.



All equipment that contains halons or refrigerants must have the material removed by a certified technician. Turn in equipment to DLADS with DA Form 1348-1A and certification of removal of ODS by a licensed technician.

In the event of accidental or unintentional release of ODS on Fort Novosel, immediately contact the Air Program Manager. Service records should be maintained by Certified Technicians who service ODS containing equipment on Fort Novosel.

Ask questions when new equipment is being considered:

- What type of fuel does it use?
- Will any volatile compounds be used during operation?
- Is the equipment on the list of commonly found air emission sources that may require permitting?

Ask questions when new construction or renovation projects are in the planning phase, such as:

- Will any installed equipment affect air emissions?
- Will any of the activities planned during the construction phase require a permit?
- Do the plans address potential issues with air quality or permitting?
- Has sufficient time for permitting process been allowed in the construction schedule?

14.3 AEROSPACE NESHAP

Fort Novosel is subject to the Aerospace Manufacturing and Rework Facilities National Emission Standards for Hazardous Air Pollutants (NESHAP). Hazardous Air Pollutants (HAPs) cause serious health and environmental hazards. The sources regulated by the Aerospace NESHAP include:

- Hand-wipe cleaning operations;
- Spray gun cleaning operations;
- Flush cleaning operations;
- Primer application operations;
- Topcoat application operations;
- Specialty coatings;
- Depainting operations;
- Chemical milling maskant application operations; and
- Waste storage and handling operations.

For activities where Aerospace NESHAP applies:

- Maintain proper records;
- Use only approved paints and solvents ;
- Operate control devices should be operated; and
- Ask questions when projects are in planning phase.

13.5 SCRAP AND USED TIRES

Fort Novosel currently has a Class Two Receivers registration with ADEM. Organizations that generate scrap and used tires must accumulate tires inside of a building or other covered structure and they must be protected from the elements.

Tires should be turned in to DLADS/SSA for further processing using DD Form 1348-1A. Tenant organizations that do not use DLADS/SSA are required to maintain compliance with all ADEM requirements and will be inspected by Fort Novosel personnel to ensure compliance with all requirements. All shipments of scrap tires off of Fort Novosel property will be documented on ADEM Form 536, *Scrap Tire Manifest*. This must be prepared as a four-part, carbonless-paper form. COPIES OF MANIFESTS MUST BE KEPT IN THE OPERATING RECORD AND SHOULD NOT BE SENT TO ADEM. The use of ADEM supplied decals for any vehicle used to transport scrap tires off-site is required.

Receivers must submit quarterly reports to ADEM electronically using the Alabama Environmental Permitting and Compliance System or AEPACS. Copies of all correspondence from ADEM must be submitted to DPW-ENRD within seven (7) working days. Quarterly reports must be submitted by the due date even if no tires were transported. Organizations that generate scrap tires must maintain an operating record that will include the following:

- Registration application sent to ADEM.
- Registration approval package received from ADEM.
- A copy of all completed manifests for tire shipments.
- A copy of financial assurance documentation.
- A copy of all quarterly reports submitted to ADEM.
- All other documents concerning scrap or used tires submitted to ADEM or received from ADEM.
- All other documents related to scrap or used tires at your business.

13.6 RECYCLING

The Fort Novosel Recycling Center is located at Bldg. 9322 on Mayfield Ave. and can be contacted at 334-255-0468. The following table shows recyclable items on Fort Novosel:

ITEM	WHERE TO RECYCLE
Aluminum cans	Take to Recycling Center
Antifreeze	Take to HMCC
Batteries	Take to HMCC or to Recycling Center. Batteries in excess of one 5-gallon bucket or 15 used Lead-Acid must go to HMCC.
Cell phones	Drop off locations at the Recycling Center or the HMCC
Cardboard (except wax-coated or food contaminated)	Designate a collection location or request a cardboard bin from the Recycling Center; Take to Recycling Center
Electronic waste	Take to Recycling Center
Fluorescent lamps	Universal waste; turn in small quantities to HMCC and full containers through the nearest 90-HWCAA.
Office Paper/ Newspaper	Use bins provided in office areas; consolidate in large green bins in central office areas; Take to Recycling Center.
Scrap metal	Take to Recycling Center
Toner cartridges	Take to HMCC or Recycling Center
Used oil / off-spec fuel	Collect in designated aboveground storage tanks.
Wood Products	Make appt with DPW Service Order Desk (334-255-9041) to take pallets, crates and wooden furniture, not on a hand receipt, to the wood lay down yard beside DLADS.

14.0 AIR QUALITY MANAGEMENT

14.1 CLEAN AIR ACT (CAA)

The purpose is to control air pollution by controlling emission limits and establishing maximum pollutant levels for ambient air. The main focus is stationary sources but the CAA also provides some regulation for mobile sources.

14.2 TITLE V OPERATING PERMIT

Fort Novosel has a Title V Operating Permit that requires an annual Emissions Inventory and a semiannual and annual Certification of Compliance. Fort Novosel has approximately 360 permitted air emission sources, including:

- Indirect Heating Equipment (boilers);
- Manufacturing or Process Operation;
- Stationary Internal Combustion Engines;
- VOC Storage Tanks (F-24, MOGAS, diesel, etc.);
- VOC Surface Coating (paint booth);
- Air Pollution Control Device (fabric filter);
- Solvent Metal Cleaning Units;
- Compliance Schedule; and
- Stage I Gasoline Dispensing Facilities.

Projects with a potential to increase emissions require prior approval. New construction projects or changes to existing sources may require modification of the Title V permit. If required, DPW-ENRD will submit a Title V modification to ADEM addressing the proposed change. Any changes to the permit require several months for approval, and coordination with DPW-ENRD early in the process is essential to ensuring that adequate time is available. *This process could take up to one year to complete.*

If constructing, modifying, or replacing a building or operation that may emit pollutants, contact DPW-ENRD to begin the process for a construction/operating permit. Failure to obtain permits prior to construction or modification can result in a NOV from ADEM or EPA.