



## OPERATING PLAN 450.4-1F

Title:	<b>INTEGRATED SAFETY MANAGEMENT SYSTEM PLAN</b>
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### ATTACHMENTS

- Attachment 1, NETL ES&H Functions, Responsibilities, and Authorities
- Attachment 2, Organizational Functions for ES&H Liaison Between NETL and Our Customers

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**FORMS**

There are no forms in this operating plan.

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1. **PURPOSE**

- a. The purpose of this plan is to document the NETL environment, safety, and health (ES&H) activities, functions, responsibilities, and authorities that support the integrated safety management system (ISMS) and the environment, safety, and health management system (ES&HMS).

2. **APPLICABILITY**

- a. This operating plan applies to all NETL employees, research associates, sites, and visitors to NETL.

3. **PLAN**

- a. Executive Summary

This integrated safety management plan is intended to support the ISMS and the ES&HMS and to define those activities, functions, responsibilities, and authorities required to maintain those systems. This plan sets forth the principles and goals by which NETL will accomplish its work so that the public, employees, **property**, and the environment are protected.

The plan was developed to meet the requirements of DOE Policy 450.4, Safety Management System Policy, and the Office of Fossil Energy's (FE) ES&H commitment that states that FE will adopt the integrated safety management system as the framework for its Environment, Safety, and Health Management System and **related** programs. This plan is also consistent with FE's functions, roles, and authorities manual (FRAM). The DOE Guidance Manual, DOE Guide 450.4-1, was used to prepare this plan.

The plan addresses the following six components:

- Component 1: Objective of Integrated Safety Management
- Component 2: Guiding Principles for Integrated ES&H Management
- Component 3: Core Functions for Integrated ES&H Management
- Component 4: Integrated ES&H Management Mechanisms
- Component 5: Responsibilities for Integrated ES&H Management
- Component 6: Implementation of Integrated ES&H Management

- b. Component 1: Objective of ISMS

NETL is committed to a management systems approach to ensure work is performed safely and in a manner which protects workers, the public, and the environment. This approach is called the integrated safety management system (ISMS), and the policy for this approach is contained in DOE Policy 450.4, Safety Management System Policy. ISMS provides a formal, organized process by which NETL plans, performs, assesses, improves, and maintains the safe conduct of work by integrating safety into the work

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process. ISMS is also the basis for NETL's ES&HMS, which is certified to the ISO 14001 and OHSAS 18001 standards. The ISMS champion and ES&HMS representative for NETL is the deputy director of the Environment, Safety, Security, and Health (ESS&H) Division.

ISMS consists of six components, as shown in Figure 1. The following sections of this plan explain how NETL implements each of these components. This plan captures the policies, roles and responsibilities, processes, and guidelines for implementing ISMS. The Functions, Responsibilities, and Authorities Manual (FRAM), Attachment 1, contains the responsibilities and authorities needed to support the ISMS.

(1) Policy

NETL will achieve environmental, safety, and health quality by proactively, systematically, and fully integrating ES&H considerations into the planning and execution of all work, so that the mission is successfully accomplished for the safety and health of the public without detriment to NETL or the environment.

NETL is committed to reducing environmental, safety, and health impacts by:

- Complying with all applicable ES&H laws, regulations, and standards through rigorous regulatory compliance programs.
- Implementing pollution prevention programs to eliminate or reduce waste and emissions and accident and incident reduction programs to eliminate or reduce accidents and incidents.
- Conserve energy and materials through resource management and recycling or reuse.
- Using safety analysis and review systems to identify, control, and reduce safety and health risks and environmental impacts through engineering and administrative controls.

NETL will work continually to improve environmental, safety, and health systems with the goal of improved ES&H performance. Performance will be measured against stated objectives and targets.

NETL will communicate information to employees and seek their involvement in reducing our environmental, safety, and health impacts and communicate our policies to stakeholders and the public.

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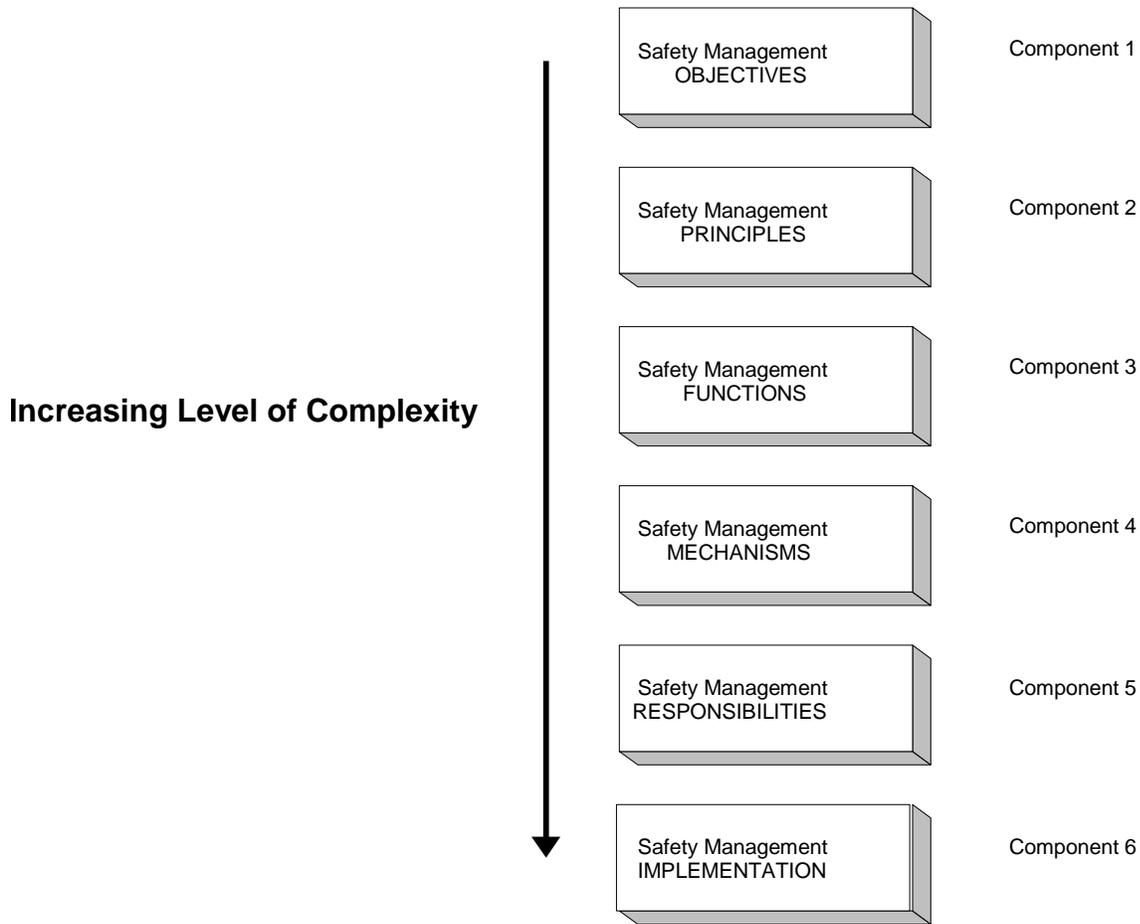


Figure 1. Integrated Safety Management System Components

(2) Commitment

NETL implements the above policy by striving to achieve DOE ES&H goals set forth in DOE Policy 450.7. In addition, NETL is committed to achieving the ES&H goals developed by the Office of Fossil Energy in the Commitment to Environment, Security, Safety, and Health.

(3) Input to Directives and Resource Allocations

NETL will provide input to departmental ES&H policies, orders, guidance, and strategic decisions that may affect the NETL sites. NETL commits to implement ES&H program guidance that will enhance performance at the NETL sites. NETL also commits to provide input to proposed allocations for its ES&H Program.

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c. Component 2: Guiding Principles for ISMS

The following are the principles of ISMS by which NETL will operate. By carrying out these principles, NETL ensures that its ES&HMS meets the objectives and policies stated in Component 1.

(1) Line Management Responsibility for Safety

Line management, from the NETL director down through the management ranks, has the ultimate responsibility for the safety of employees, the public, and the environment. This responsibility cannot be delegated.

(2) Clear Roles and Responsibilities

Attachment 1 is a matrix that outlines the general roles and responsibilities for the various ES&H functions within NETL. Specific roles and responsibilities are contained within NETL directives.

(3) Competence Commensurate with Responsibilities

All employees have the required competence, training, equipment, and knowledge to conduct their work in such a way as to prevent injury to employees, the public, or the environment. NETL continues to improve employee performance through training, professional certifications, advanced education, and practice.

(4) Balanced Priorities

Resources are allocated to address ES&H issues and concerns. ES&H issues are balanced with overall programmatic needs. However, no operation is ever undertaken which endangers employees, the public, or the environment unless mitigation measures are first identified and implemented to reduce the risk to an acceptable level. The primary process for planning, requesting, and allocating resources is the departmental budgeting process.

(5) Identification of Safety Standards and Requirements

NETL identifies the requirements needed to operate its facilities safely and maintains these standards by identifying hazards associated with projects, support operations, and facilities and through review of new regulatory and DOE policies. The standards are implemented in the following priority: laws, regulations, DOE orders, consensus standards, and best management practices.

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(6) Hazard Controls Tailored to Work Being Performed

The order of protective controls is engineering, administrative, and personal protective controls. All efforts are made to first provide protection through engineering controls. When engineering controls are not practical or possible, then administrative controls are used. Finally, personal protective controls are used as a last resort when engineering and administrative controls are not feasible.

(7) Operations Authorization

The safety analysis and review system (SARS), the work control system (WCS), and the work permit system (WPS) ensure that all operations containing hazards are fully reviewed, appropriate controls are implemented, and formal approval is obtained to begin the operation. The cognizant office director approves the operations under their control through the SARS.

d. Component 3: Core Functions for Integrated ES&H Management

Five core safety management functions provide the necessary structure for work activities to prevent injury to employees or the public or damage to the environment. The functions are part of a continuous cycle and are shown in Figure 2.

(1) Define Scope of Work

(a) Translate Mission into Work

NETL's mission is to resolve environmental, supply, and reliability issues associated with the use of fossil energy. The NETL Executive Board allocates resources to the work to be accomplished based on technical and political direction from DOE Headquarters and Congress. Project implementation plans describe the research and development projects to be executed, and other pertinent program plans include details of operations that support the mission.

(b) Set Expectations

Project requirements flow into R&D contracts for work that is performed offsite. These projects are overseen by project managers. Onsite requirements flow down into site support contracts through tasks which are managed by federal task contracting officers or their representatives. Site support contractors communicate requirements into subcontracts and create and maintain ISMS plans which are submitted to NETL for approval. In addition to the plans previously mentioned, directives implement the identified ES&H standards and performance expectations. These documents are available to all NETL employees.

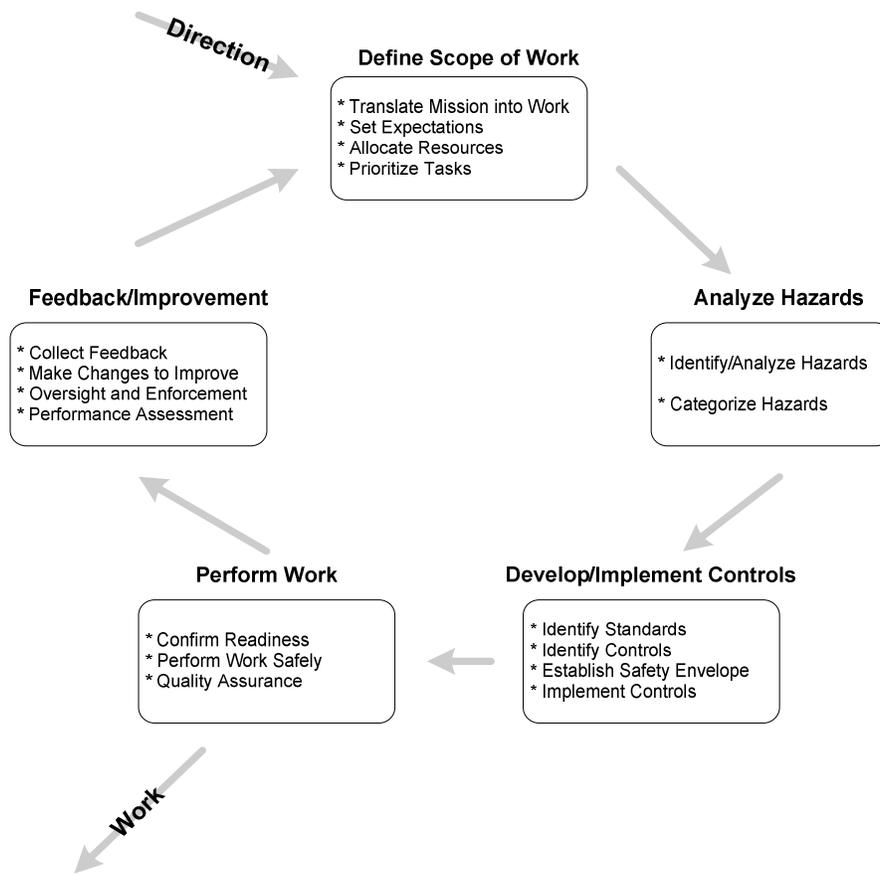


Figure 2. ISMS Functions

(c) Allocate Resources

Appropriate resources are made available to staff ES&H functions, to make corrective actions, and to maintain and improve existing programs. The mechanism for allocation captures the resource needs and provides a priority system for use of these resources.

(d) Provide for Integration

Since NETL is a government-owned, government-operated laboratory, ES&H is integrated across all NETL sites, operations, and employees, including contractors. All employees must adhere to NETL ES&H requirements, policies, and procedures, regardless of employer. NETL employees receive the same ES&H training and have access to ES&H program documentation. The ES&H program is seamless across all of NETL.

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(e) Prioritize Tasks and Allocate Resources

ES&H tasks are prioritized based on the hazards and associated risks of the project, support operation, or facility. The hazards and risks are analyzed through the safety analysis and review system, which also provides for mitigation strategies and controls to ensure that risk is managed and maintained at the lowest level possible.

(2) Analyze the Hazards

(a) Identify Hazards

Before any project, support operation, or facility construction or modification is undertaken, it must undergo a full safety analysis and review. This review ensures that hazards have been identified and addressed and that the operation is fully compliant with all identified ES&H standards. This review is documented in a SARS package that is maintained throughout the life of the project.

For routine work, such as preventive and corrective maintenance activities, the WCS is the primary vehicle for identifying and controlling hazards. In addition, the work permitting system (WPS) also ensures that particularly hazardous operations, such as hot work, confined space work, digging activities, or asbestos abatement, are specifically analyzed, controlled, and authorized before beginning the work activity.

(b) Analyze Hazards

The SARS ensures that hazards are analyzed and that controls for projects, support operations, and facilities are identified and implemented. Other routine work is controlled through the WCS and WPS, which analyze hazards and ensure that appropriate control measures are in place before the work commences.

(c) Categorize Hazards

Unmitigated hazards are categorized through the SARS as to their severity and probability. Mitigation methods to be implemented are documented, along with the resultant risk level. Operations are not permitted to continue with unacceptable risks to line management.

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(3) Develop and Implement Hazard Controls

(a) Identify Standards and Requirements

NETL maintains a set of ES&H standards by which ES&H programs are maintained and audited. The list of standards is maintained through the NETL directives process, with input from SARS processes and the regulatory/DOE requirements review process, by adding standards as new hazards or requirements arise or by removing standards if the hazard or requirement no longer exists. These standards are implemented through local policies, plans, procedures, and employee training. These standards are also referred to as the Focused Standards List (FSL).

Exemptions from any approved standard are requested through the ES&H program managers. Exemptions from consensus standards are approved at the local level. Exemptions from DOE or regulatory requirements are forwarded to DOE-HQ for review and submission to the regulatory authority.

(b) Identify Controls to Prevent and Mitigate Hazards

Following the SARS process, which identifies the hazards and the associated mitigation methods, engineering controls are implemented during the design and construction of the project or facility. The administrative controls and personal protective controls are implemented through procedures and training before and during the life of the project or operation. All efforts are made to control hazards through engineering controls. However, administrative and personal protective controls are implemented when engineering controls are not feasible.

(c) Establish Safety Controls

The safety envelope is established by the SARS and documented in the permit application and operating procedures. Approval of the operating permit is an approval of this safety envelope. For routine activities, the WCS establishes the safety envelope.

(d) Implement Controls

Line management is responsible for implementing identified controls. Controls are documented in procedures and communicated to employees. Oversight is provided by line management to ensure that the controls are being implemented and continue to provide the expected level of protection. Internal audits also help to determine if controls are being followed and are effective.

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- (4) Perform Work
  - (a) Confirm Readiness

Prior to startup of any project or operation, the SARS review is approved by line management. This is documented through a construction, operating (for projects and operations), or use (for facilities) permit or other authorization mechanism. The construction permit is valid as long as the project or facility is under construction. The operating permit is valid until a significant change to hazard level or hazard control requires a modification to the permit. The use permit is valid as long as the facility continues to be used for the purpose for which it was approved. The ESS&H Division and the Engineering Research Division jointly conduct annual assessments of permitted operations to determine if projects are operating within their safety envelope and scope of authorization. The Site Operations Division is responsible for oversight of all facility SARS permits.

For routine work, the WCS is used to document the work, the hazards, and the appropriate protective actions to take. Other uniquely hazardous activities such as hot work, confined space, asbestos abatement, or lead abatement require the issuance of a work permit.

Line management is responsible for ensuring that operations are conducted within the approved safety envelope.

- (b) Perform Work Safely

All employees are responsible to perform work safely and in accordance with requirements. Line management is responsible for ensuring that the workers are properly trained, equipment is provided and in good working order, operating procedures are correct and available, and that materials to accomplish the work are appropriate and do not present hazards to employees.

Employees who are found to consistently disregard ES&H requirements will be subject to the appropriate disciplinary actions. These procedures include informal reprimands, written reprimands, suspensions, and termination.

Information regarding suspected criminal activity will be forwarded to the appropriate law enforcement agency for action. NETL will not tolerate intentional disregard for the safety of others and will take necessary action to prevent harm to employees, the public, or the environment.

All work conducted on the NETL site for any agency is subject to the same ES&H requirements consistent with the Integrated Safety Management System.

(5) Feedback and Continual Improvement

(a) Collect Feedback Information

Feedback is provided through annual assessments, oversight of the operation by line management, program assessments, and internal and external audits. Changes to standards and processes are made as needed to provide improved levels of safety. Any operation that is not conforming to requirements is stopped until it is brought into conformance.

NETL also collects ES&H performance indicators. These include ISO 14001/OHSAS 18001 metrics, high level institutional ES&H metrics, Office of Institutional and Business Operations metrics, ESS&H Division metrics, and DOE-HQ required metrics.

NETL maintains a Lessons Learned Program that includes a review of lessons from internal and other sources, such as DOE sites, industrial facilities, and trade publications; applies lessons learned within NETL; and tracks the results of the Lessons Learned Program. NETL communicates these lessons to the NETL organization and to DOE.

NETL will report occurrences through the DOE Occurrence Reporting and Processing System (ORPS) in accordance with DOE directives. NETL will also report injury and illness information to the DOE Computerized Accident and Incident Reporting System (CAIRS) in accordance with DOE directives.

(b) Identify Improvement Opportunities

The information collected is analyzed by the ESS&H Division and reported to NETL senior management and the NETL organization. If trends show that the process or system is degrading, improvement plans are developed to bring the process back into conformance with the requirements. Improvement plans are documented, prioritized, and budgeted through the DOE/FE budget process.

Improvement opportunities are also identified from ISO 14001/OHSAS 18001 internal and external audits.

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(c) Make Changes to Improve

ES&H program managers have the responsibility for oversight and improvement of their specific ES&H programs. ES&H managers have responsibility for recommending policy and continual improvement initiatives.

Workers are involved in the development and implementation of the ES&H management system. This includes participation in the development and implementation of policies, plans, and procedures; work process and hazard evaluations; and established feedback and continuous improvement processes.

(d) Oversight and Enforcement

Line management has the first responsibility for oversight and enforcement of ES&H requirements. This oversight is accomplished in several ways: informal reviews of operations, site and facility (informal) walkthroughs, formal inspections and assessments, internal and external audits, annual performance appraisals, and other mechanisms deemed appropriate by the responsible line manager. All employees have the authority to stop operations that are immediately dangerous to the life or health of employees or the public or which present potential harm to the environment. Only line management has the authority to restart operations after they are satisfied that the hazard has been addressed satisfactorily.

Onsite support contractors doing work at an NETL site are subject to the same ES&H requirements as DOE employees. Assessment of contractor work performed, including ES&H aspects of that work, is the responsibility of the contracting officer and the contracting officer's representatives. The contracting officer has the authority and responsibility to inform contractors of violations of ES&H requirements and to take necessary action, including contract termination, to ensure that employees, the public, and the environment are not harmed.

e. Component 4: Integrated ES&H Management Mechanisms

NETL ensures that the above functions are carried out through documented processes which set expectations for performance. The following is applied when developing mechanisms:

- Directives are developed and maintained to provide direction to employees and contractors working at NETL sites. The direction includes the processes used to implement ISMS and ensure that the ISMS is integrated with the ES&HMS and its associated processes.

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- The primary processes for hazard analysis and control are the safety analysis and review system (SARS), the work control system (WCS), and the work permit system (WPS). These processes are used to identify, analyze, and provide controls for hazards associated with NETL operations.
- ES&H standards are maintained by NETL's ESS&H division director and supported through SARS/WCS and regulatory/DOE order reviews.
- Additional processes and programs are developed to comply with regulations, DOE requirements, and other standards adopted by NETL.

f. Component 5: Responsibilities for Integrated ES&H Management

This chapter outlines the functions, responsibilities, and authorities for NETL's organization.

(1) NETL ES&H Program Implementation

The functions, responsibilities, and authorities for ES&H Program implementation are contained in the matrix in Attachment 1. This organizational matrix shows the responsibilities for each office and division that have some role or responsibility for developing, implementing, maintaining, or overseeing the NETL ES&H Program.

The matrix is based on the following principles:

- Responsibility, accountability, authority, and resources for implementation are located within the organization where the work is performed.
- Site-wide ES&H programs are developed, managed, and implemented by the ESS&H Division, unless otherwise noted on the matrix.

(2) Interface with External Entities

A second matrix found in Attachment 2 outlines the interfaces between NETL and external entities for the ES&H Program. This matrix is based on the following principles:

- The ES&H program managers have general liaison functions on policy issues.
- The ESS&H Division has liaison and reporting functions for those activities for which it is primarily responsible, including program development and implementation functions.

(3) Contractors

Onsite support contractors doing work on the NETL sites are subject to NETL's ES&H requirements. This is documented in contracts and the referenced directives. NETL strives for a unified ES&H program with the same requirements for all NETL employees, regardless of their employer.

g. Component 6: Implementation of Integrated ES&H Management

By implementing this plan, NETL is confident that the principles of ISMS will be fully implemented. Work will be defined and planned and hazards will be identified and controlled. Work will be performed safely, monitored, and assessed. Needed improvements will then be implemented.

This plan is reviewed for effectiveness in conjunction with the NETL's auditing process. Annually, co-incident with the development of NETL's annual ES&H objectives and targets, NETL will declare to the secretary of fossil energy that it is in conformance with the ISMS requirement and provide him with a copy of the next fiscal year's objectives and targets.

Internal verification of the ISMS will occur once every 3 years in conjunction with the full external surveillance ISO 14001 and OHSAS 18001 audits. Continued certification to the ISO 14001 and OHSAS 18001 standards is considered sufficient to ensure that ISMS requirements are being implemented.

4. RESPONSIBILITIES

a. ESS&H Division Director

(1) Ensures that all ES&H programs developed are in accordance with the principles contained within the plan.

b. Deputy ESS&H Division Director

(1) Acts as ISM champion and ESS&H management system representative for NETL.

c. Safety and Health Team Leader

(1) Ensures that the plan is maintained, reviewed annually, and updated as needed.

d. Line Managers

(1) Ensure that their ES&H functions, responsibilities, and authorities as contained in the plan are implemented.

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- e. Employees
  - (1) Carry out their ES&H responsibilities identified in the plan and in all integrated safety management directives that support the plan.

### 5. **REQUIREMENTS**

- a. DOE Policy 411.1, [Safety Management Functions, Responsibilities and Authorities Policy](#).
- b. DOE Policy 450.4, [Safety Management System Policy](#).
- c. DOE Policy 450.7, [Environment, Safety, and Health \(ES&H\) Goals](#).
- d. DOE Manual 411.1-1, [Safety Management Functions, Responsibilities, and Authorities Manual](#).
- e. **DOE Manual 450.4-1, [Integrated Safety Management System Manual](#).**
- f. Office of Fossil Energy, Commitment to Environment, Security, Safety and Health, November 2006.
- g. NETL Order 421.1, [Safety Analysis and Review System](#).
- h. NETL Order 440.1, [Safety and Health Program](#).
- i. NETL Order 436.1, [Departmental Sustainability](#).
- j. NETL Order 450.4, [Integrated Safety Management Program](#).

### 6. **REFERENCES**

- a. NETL Procedure 421.1-1, [R&D Safety Analysis and Review System](#).
- b. NETL Procedure 421.1-2, [Support Operations Safety Analysis and Review System](#).
- c. NETL Procedure 421.1-3, [Facility Safety Analysis and Review System](#)

### 7. **DEFINITIONS**

- a. None.

8. **REVISION HISTORY**

<b>VERSION</b>	<b>DATE</b>	<b>SUMMARY OF CHANGES</b>
Original	5/23/00	The purpose of this plan is to establish the NETL environment, safety and health (ES&H) functions, responsibilities, and authorities that support the Integrated Safety Management Program.
A	9/20/02	These revisions reflect changes in the NETL organizational structure and the resulting changes in ES&H functions, responsibilities, and authorities. This revision was also required due to DOE's policy to update the ES&H functions, responsibilities, and authorities manual (FRAM) on a periodic basis. Also, the crosswalk between the NETL FRAM and DOE-HQ FRAM has been removed from the operating plan to make this document more readable. The crosswalk will be updated and will be placed separately on the intranet for informational purposes.
B	12/23/02	These revisions reflect changes in the NETL integrated safety management (ISM) policy. The policy was updated to incorporate the environmental management system (EMS) into the ISM infrastructure. The 1998 ES&H policy memorandum was also removed from the document.
C	10/15/03	These revisions reflect changes in the ES&H integrated safety management plan that incorporate provisions involving the environmental management system (EMS) at the laboratory, and updates references and other ES&H program implementation activities.
D	9/17/04	These revisions reflect changes in the ES&H integrated safety management plan that incorporate provisions involving the new requirements for Department of Energy ES&H goals and recent NETL organization changes.
E	4/2/08	Major revisions were made to conform to updated DOE requirements and the requirement to develop an ISM description. Other minor changes were made for clarity and accuracy.
F	7/16/10	Minor changes were made to address finding 350-2009-0052. Other changes were made to include the annual requirement to declare the ISM in conformance, to identify the ISM champion (deputy ESS&H director as part of his duties as ES&H MS representative), and the inclusion of DOE Manual 450.4-1 in the list of requirements.

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**NETL ES&H Functions, Responsibilities, and Authorities**

*ES&H Functions, Responsibilities, and Authorities*

Office/Division					
Director/Chief Operating Officer	SCC/OSAP/SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
<b>Program Planning and Development</b>					
Approves ES&H orders.	Develops SCC/OSAP/SCNGO/PMC ES&H programs/procedures based on NETL policy.  Participates in relevant ES&H program/procedure development.	Develops ORD ES&H programs/procedures based on NETL policy.  Participates in relevant ES&H program/procedure development.  Coordinates with other relevant NETL offices in development of ORD ES&H programs/procedures.	Director approves NETL ES&H directives.	Sponsors development of NETL ES&H orders, operating plans, and procedures. Establishes ES&H goals and performance measures.  Develops site-wide <sup>4</sup> ES&H programs/procedures based on NETL policy.  Participates in relevant ES&H program/procedure development.  Coordinates with other relevant NETL offices in development of site-wide ES&H programs/procedures.  Reviews, coordinates, and tracks revisions to ES&H procedures.  Provides input to senior management on ES&H policies.  Provides oversight of ES&H standards to ensure they are relevant and consistent.	Develops SOD ES&H programs/procedures based on NETL policy.  Participates in relevant ES&H program/procedure development.  Coordinates with other relevant NETL offices in development of SOD ES&H programs/procedures.
Develops ES&H mission and policy.					
Approves and issues ES&H policies.					
Provides legal counsel on ES&H issues.					

<sup>4</sup> The term “site-wide” means ES&H programs that are not otherwise specifically assigned to organizations in other blocks of the table and includes the following as examples: chemical inventory and MSDS management, non-hazardous waste management (e.g., recycling), site-wide (general) HAZCOM, and lead and asbestos abatement activity.

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**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director/Chief Operating Officer	SCC/OSAP/SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
<p>Provides general oversight of the NETL ES&amp;H standards and requirements identification and maintenance process.</p> <p>Appoints ES&amp;H representative. Approves ES&amp;HMS policy. COO designated as ES&amp;HMS steward and champion.</p>	<p>Encourages personnel to seek resolution of ES&amp;H concerns with first-line supervisors or through existing complaint or dispute resolution systems.</p> <p>Assists in the resolution of employee ES&amp;H concerns and cooperates with assessments used to verify the organization has acted to minimize, correct, or prevent recurrence of a situation that precipitated a valid concern.</p>	<p>Encourages personnel to seek resolution of ES&amp;H concerns with first-line supervisors or through existing complaint or dispute resolution systems.</p> <p>Assists in the resolution of employee ES&amp;H concerns and cooperates with assessments used to verify the organization has acted to minimize, correct, or prevent recurrence of a situation that precipitated a valid concern.</p>	<p>COs/CORs will incorporate an applicable ES&amp;H standards and requirements list as contractual requirements in major onsite SSC procurements.</p> <p>Encourages personnel to seek resolution of ES&amp;H concerns with first-line supervisors or through existing complaint or dispute resolution systems.</p> <p>Assists in the resolution of employee concerns and cooperates with assessments used to verify the organization has acted to minimize, correct, or prevent recurrence of a situation that precipitated a valid concern.</p>	<p>Develops and maintains NETL ES&amp;H Focused Standards List.</p> <p>Develops and maintains a register of NETL directives.</p> <p>Deputy division director is designated as ES&amp;HMS representative.</p> <p>Develops Employee Concern Program (ECP) processes, procedures to report concerns.</p> <p>Maintains ECP tracking system and a secure filing system.</p> <p>Prepares quarterly and annual reports and reviews them for lessons learned and possible trends.</p>	<p>Encourages personnel to seek resolution of ES&amp;H concerns with first-line supervisors or through existing complaint or dispute resolution systems.</p> <p>Assists in the resolution of employee ES&amp;H concerns and cooperates with assessments used to verify the organization has acted to minimize, correct, or prevent recurrence of a situation that precipitated a valid concern.</p>

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**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director/Chief Operating Officer	SCC/OSAP/SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
Delegates stop work and restart authority for NETL operations.	Shuts down work if a clear and present ES&H danger exists and promptly notifies ESS&H DD.	Shuts down work if a clear and present ES&H danger exists and promptly notifies ESS&H DD.  Determines the appropriate level of readiness for the startup of operations.	Shuts down work if a clear and present ES&H danger exists and promptly notifies ESS&H DD.	Shuts down work if a clear and present ES&H danger exists and promptly notifies ORD, SOD, SSC, and/or CO as necessary.	Shuts down work if a clear and present ES&H danger exists and promptly notifies ES&H, ORD, SSC, and/or CO as necessary.  Determines the appropriate level of readiness for the startup of operations.

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Operating Plan 450.4-1F, Integrated Safety Management System Plan

**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director	SCC/OSAP/ SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
<b>Program Implementation</b>					
<p>Accepts responsibility for ES&amp;H performance of NETL.</p> <p>Appoints authorities (i.e., NCO, signature authority).</p> <p>Provides NETL ES&amp;H spokesperson for emergency preparedness.</p> <p>Implements ES&amp;H procedures.</p>	<p>Office director accepts responsibility for ES&amp;H performance of SCC/OSAP/SCNGO/PMC. Manages budget of SCC/OSAP/SCNGO/PMC ES&amp;H programs and activities.</p> <p>Implements ES&amp;H procedures. Maintains awareness of ES&amp;H aspects of contracted R&amp;D activities. Prepares NEPA documentation for SCC/OSAP/SCNGO/PMC projects.</p> <p>Puts appropriate ES&amp;H requirements into contracted R&amp;D.</p>	<p>Office director accepts responsibility for ES&amp;H performance of ORD.</p> <p>Manages budget of ORD ES&amp;H programs and activities.</p> <p>Assigns individuals responsible for ORD ES&amp;H programs (points of contact).</p> <p>Implements ES&amp;H procedures. Manages contractor resources for ORD ES&amp;H programs. Prepares NEPA documentation for ORD projects.</p> <p>Trains ORD employees on R&amp;D project specific hazards.</p>	<p>Office director accepts responsibility for ES&amp;H performance of OIBO.</p> <p>Implements ES&amp;H procedures.</p> <p>Develops and manages ES&amp;H directives control system (policy related).</p>	<p>Manages budget of site-wide ES&amp;H programs and activities.</p> <p>Appoints authorities (i.e., AHJ). Assigns individuals responsible for site-wide ES&amp;H programs (points of contacts).</p> <p>Manages ISM, lessons-learned, QA, ORPS, CAIRS, and ES&amp;H oversight budgets.</p> <p>Implements ES&amp;H procedures. Manages contractor resources for site-wide ES&amp;H programs. Prepares NEPA documentation for ES&amp;H Division projects. Coordinates site-wide ES&amp;H training.</p> <p>Manages site-wide ES&amp;H programs. Manages lessons learned, ORPS, and CAIRS programs.</p>	<p>Manages budget of SOD ES&amp;H programs and activities.</p> <p>Assigns individuals responsible for SOD ES&amp;H programs (points of contact).</p> <p>Implements ES&amp;H procedures. Manages contractor resources for SOD ES&amp;H programs. Prepares NEPA documentation for SOD projects. Trains SOD employees on SOD project specific hazards.</p> <p>Minimizes waste.</p>

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**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director	SCC/OSAP/ SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
Approves environmental assessments. Approves CXs (NCO).	Manages NEPA program.	Minimizes waste and chemical inventories.		<p>Provides regulatory oversight of wastewater treatment facility.</p> <p>Manages and provides oversight of hazardous waste facility.</p> <p>Manages inactive waste site remediation.</p> <p>Manages recycling and pollution prevention programs.</p> <p>Reviews, approves, and processes ES&amp;H exemption requests for NETL.</p> <p>Coordinates statutorily-required information gathering for site-wide ES&amp;H programs (reporting and permits).</p> <p>(Manages NEPA documentation preparation upon request.)</p> <p>Provides consultation to NEPA document managers and project managers.</p> <p>Manages lead and asbestos abatement in collaboration with SOD.</p> <p>Manages chemical inventory system, MSDS information.</p> <p>Provides site-wide HAZCOM program and communication.</p> <p>Supports accident/incident investigations.</p>	Manages wastewater treatment facility.

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**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director	SCC/OSAP/ SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
<b>Oversight, Assessment, Auditing, Inspections</b>					
<p>Reviews and acts on ES&amp;H performance.</p> <p>COO reports ES&amp;HMS performance to senior staff at management review meetings.</p>	<p>Self-assessment of SCC/OSAP/SCNGO/PMC ES&amp;H activities. Provides ES&amp;H performance information upon request.</p>	<p>Self-assessment of ORD ES&amp;H activities. Provides ES&amp;H performance information upon request.</p>	<p>Self-assessment of all ES&amp;H activities.</p> <p>Conducts or coordinates ES&amp;H site-wide performance audits for NETL activities.</p>	<p>Self-assessment of ES&amp;H activities.</p> <p>Provides ES&amp;H performance information upon request.</p> <p>Conduct ES&amp;H inspections (e.g., OSHA, chemical hygiene, and construction activities).</p> <p>Reports to NETL senior staff and HQ on NETL ES&amp;H performance. Provides human resources for ES&amp;H assessments (subject matter experts). Reviews construction designs for ES&amp;H concerns. Performs regulatory ES&amp;H program self-assessments. Division director reports ES&amp;HMS performance to senior staff at management review meetings.</p> <p>Acts as assessors in auditing achievement of ES&amp;HMS objectives/targets and EMPs.</p>	<p>Self-assessment of ES&amp;H activities.</p> <p>Provides ES&amp;H performance information upon request.</p>

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**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director	SCC/OSAP/ SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
<b>R&amp;D Operations</b>					
		R&D SARS process caretakers.  Appoints ERD representatives for R&D SARS. Initiates R&D SARS packages.  Office director approves ORD SARS packages. Establishes and maintains project operating procedures for R&D operations.		Provides consultation and review of R&D SARS packages.  Provides ES&H representatives and assessors to R&D SARS processes.	

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**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director	SCC/OSAP/ SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
<b>Facilities, Support Operations, and Properties</b>					
		<p>Approves all modifications to R&amp;D property (e.g., facilities and buildings).                      Coordinates all R&amp;D facility changes with SOD.                      Analyzes and controls ORD hazards.                      Jointly with SOD establishes a split of facilities responsibilities.                      Jointly with SOD establishes a split of utilities responsibilities related to ES&amp;H.                      Consults and coordinates with ES&amp;H and SOD Divisions on ORD construction activities.</p>	<p>Office director approves facility SARS packages.</p>	<p>Provides consultation and review of facility and support operation SARS packages.                       Provides ES&amp;H representatives and assessors to facility and support operation SARS processes.                       Provides consultation and review for facility construction and use (Facility SARS).                       Provides guidance for site-wide alarms standardization (gas alarms).                       Monitors ES&amp;H aspects of offsite properties.                       Provides consultation and review for support operation SARS.</p>	<p>Approves all modifications to NETL property (e.g., facilities and buildings).                       Coordinates all facility changes.                       Analyzes and controls SOD hazards.                       Coordinates the development of and manages the NETL facility configuration management process.                       Coordinates network for site-wide alarms.                       Maintains facility records and drawings.                      Develops and implements facility operating procedures.                      Coordinates design and construction reviews and activities with ES&amp;H Division.</p>
		<p>Generates support operation SARS for support activities under their management.</p>	<p>Generates support operation SARS for support activities under their management.</p>	<p>Generates support operation SARS for support activities under their management.</p>	<p>Generates support operation SARS for support activities under their management.                       Facility SARS process caretakers.                      Initiates facility SARS packages.</p>

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**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director	SCC/OSAP/ SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
Communication, Information, Committees					
Director appoints ES&H management review team.	Completes corrective actions for SCC/OSAP/SCNGO/PMC.	Completes corrective actions for ORD office.  Appoints ORD representatives to ES&HMS cross-cutting team.	Completes corrective actions for OIBO.  Validates/verifies performance of completed corrective actions.  Coordinates formal responses to HQ on directives (e.g., policies, orders).	Communicates lessons learned to appropriate NETL employees. Maintains databases and records for site ES&H conditions and assigned performance measures.  Maintains databases on ES&H standards, performance measures, and performance trends. Maintains an ES&H corrective action tracking system.  Analyzes ES&H databases for performance trends. Maintains an audit and inspection database and regulatory compliance database. Completes corrective actions for ES&H Division.  Appoints ES&H representatives to ES&HMS cross-cutting team.  Interfaces with HQ on ES&H issues and initiatives within (NETL's) area of responsibility. Provides input to formal responses to HQ on ES&H directives (e.g., policies and orders).	Maintains databases for site maintenance activities.          Completes corrective actions for Site Ops Division.          Identifies responsible officials for work spaces and operations. Coordinates GPP and ES&H projects with ORD and ES&H.
		Identifies responsible officials for work spaces and operations.	Oversees ES&H dispute resolution among NETL offices.	Coordinates cross-office/division aspects of ES&H.	

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***ES&H Functions, Responsibilities, and Authorities***

Office/Division					
Director	SCC/OSAP/ SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
		Provides technology consultation on ES&H issues.		Provides ES&H policy and NEPA consultation services to NETL employees (e.g., SARS, OSHA, etc.).  Facilitates public interactions related to ES&H.	Coordinates periodic ES&H-related operating and maintenance activity meetings with ORD and ES&HD.

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**ES&H Functions, Responsibilities, and Authorities**

Office/Division					
Director	SCC/OSAP/ SCNGO/PMC	ORD	OIBO	ESS&H Division	Site Operations Division
<b>Continuous Improvement and Corrective Action</b>					
		Develops and prioritizes ORD ES&H corrective actions.  Recommends new or modifications to design standards affecting ES&H (e.g., factor of safety).		Develops and prioritizes ES&H Division's corrective actions.  Oversees NETL ES&H corrective action tracking system. Provides ES&H benchmarking information.  Manages and oversees ES&H continuous improvement process and initiatives.	Develops and prioritizes SOD's ES&H corrective actions.  Recommends new or modifications to design standards affecting ES&H (e.g., factor of safety).  Establishes maintenance priorities considering ES&H requirements. Implements ES&H-related improvements and corrective actions to infrastructure (e.g., ventilation).

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**Organizational Functions for ES&H Liaison Between NETL and Our Customers**

LIAISON ITEM	PRINCIPAL NETL POC	NOTIFICATIONS (Within NETL)	ACTION	DISTRIBUTION (Within NETL)	DISTRIBUTION (Outside NETL)
Proposed Legislation Review	DD	DD and SMEs	OIBO with SME and DD input	DD and SMEs	EH FE-7 Others as needed
Regulator Coordination	SMEs	DD and SMEs	SMEs	DD and SMEs	Regulator Local Municipality
DOE Order and Policy Correspondence	DD	DD and SMEs	OIBO with SME and DD input	DD and SMEs	FE-7
FE Pipeline (ES&H Newsletter)	DD	SMEs	DD with SME input	All ES&H staff	FE-7
Weekly ES&H Report	DD	All ES&H staff	DD with input	All ES&H staff	FE-7
Periodic OSHA Reports (e.g., CAIRS and FEOSH)	SHM	DD and SMEs	SHM with SME input	DD OIBO director	INEL and FE-7
ORPS Reports	Facility manager for ORPS	Facility representative for ORPS	Facility manager	Facility representative DD	INEL HQ ORPS program manager FE-7 Regulator Municipality
Periodic ES&H Reports	DD	SMEs	DD with SME input	SMEs	FE-7, EH, EM INEL, Regulatory Agency (as appropriate)
ES&H Conference Call	DD	SHM and EM	DD, SHM, and EM	As needed	FE-7 All FE sites
Performance Indicators	DD	SMEs	DD with SME input	Senior staff and SMEs	FE-7
Meetings and Conferences	DD	SMEs	DD and SMEs	SMEs	
Budget Coordination	DD	SHM, EM, and SMEs as needed	DD	SHM, EM, and SMEs as needed	FE-7
ES&H Management Plan	DD	SHM, EM, and SMEs as needed	DD	SHM, EM, and SMEs as needed	FE-7

DD — Division Director, ESS&H  
 SHM — Safety and Health Manager  
 EM — Environmental Manager  
 SME — Subject Matter Expert  
 OIBO — Office of Institutional and Business Operations

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