

U.S. Department of Energy

Oak Ridge Office

ORO O 250 Chapter V Change 6

DATE: 04/18/2006

**SUBJECT: DEVELOPMENT, APPROVAL, AND MAINTENANCE OF WORK SMART
STANDARDS SETS**

1. PURPOSE. This Chapter correlates to DOE P 450.3, AUTHORIZING USE OF THE NECESSARY AND SUFFICIENT PROCESS FOR STANDARDS-BASED ENVIRONMENT, SAFETY AND HEALTH MANAGEMENT, dated January 25, 1996; and DOE M 450.3-1, THE DEPARTMENT OF ENERGY CLOSURE PROCESS FOR NECESSARY AND SUFFICIENT SETS OF STANDARDS, dated January 25, 1996. It assigns responsibility and accountability and provides administrative and/or contractual guidance to Oak Ridge Office (ORO) and its contractors that choose to develop Work Smart Standards (WSS) Sets. Nothing in this issuance changes any requirements contained in any Department of Energy (DOE) Directive.
2. CANCELLATION. This Chapter cancels and replaces ORO O 250, Chapter V, Change 5, DEVELOPMENT, APPROVAL, AND MAINTENANCE OF WORK SMART STANDARDS SETS, dated December 3, 2003.
3. APPLICABILITY. The provisions of this Chapter apply to the Federal and site/facility management contractor staffs who perform work related to the ORO contracts with List B requirements (List B) administered by the Directives Management Group (DMG). Contractors who choose to develop WSS Sets must adhere to the process described in DOE M 450.3-1, and to the requirements and procedures in this Chapter.
4. RESPONSIBILITIES.
 - a. Manager. If requested by the Convened Group, approves WSS Sets for initial applications and revisions/changes.
 - b. Divisions of Primary Interest (DPIs) participate in development, confirmation, maintenance, and, when appropriate, approval activities for contractor WSS Sets as requested by the Contracting Officer's Representative (COR).
 - c. Principal Staff participate in development, confirmation, maintenance, and, when appropriate, approval activities for contractor WSS Sets.
 - d. Contracting Officer's Representatives.
 - (1) The COR determines DPI involvement and provides information, as the COR deems appropriate, to the DPI.

- (2) When appropriate, approves WSS Set revisions/changes.
- e. Convened Group, Process Leader, Identification Team, Confirmation Team, and Stakeholders are designated positions used exclusively in the WSS Set process. For definitions and responsibilities of these positions, see Attachment 2, Chapter I, of this Directive.
- f. Team Leader, Directives Management Group.
 - (1) Provides advice and assistance to ORO staff and contractors on subjects covered in this Chapter.
 - (2) On request from the COR, coordinates with the contractor and Principal Staff to determine the composition of an appropriate Convened Group for an initial WSS development effort or revision to a WSS Set.
 - (3) On request from the COR, works with the contractor to coordinate development, confirmation (if needed), and approval of initial WSS Sets and revisions thereto.
 - (4) On request from the COR, incorporates approved WSS Sets or revisions/changes into the contract and posts this information on the DMG Home Page.
 - (5) Maintains the official WSS Set files for information and historical purposes, if provided by the CORs or their staff.

5. REQUIREMENTS AND PROCEDURES.

- a. Introduction. Identification of appropriate standards is an essential part of the Standards Management Program. For environment, safety, and health (ES&H) standards/requirements, the following processes are available:
 - Comply with all applicable DOE/ORO ES&H Directives in List B by number and/or reference in the WSS Set or S/RID,
 - Maintain a DOE-approved S/RID, and/or
 - Develop and maintain one or more DOE-approved WSS Sets (formerly referred to as the Necessary and Sufficient Process).

A WSS Set contains the ES&H standards that are necessary and sufficient to provide an adequate level of protection to workers, the public, and the environment for the identified scope of work. WSS Sets automatically include all applicable Federal, State, and local laws and regulations from which DOE is not exempt. In addition, the WSS Set includes other standards (or portions thereof) selected to ensure that adequate ES&H protection is provided. These standards may be chosen from a variety of sources, including voluntary consensus standards, DOE Directives, DOE Technical Standards, and DOE Headquarters (HQ) program direction documents.

WSS Sets are nontransferable. WSS Sets are developed and approved for a specific scope of work that is clearly identified in the Final Report for the WSS Set. While it is acceptable for

an Identification (ID) team to use an existing WSS Set as the starting point for its analyses and deliberations, a WSS Set approved for one scope of work must not be blindly copied for another scope of work, even if the second scope of work looks rather similar to the first. The full WSS process must be applied to developing the WSS Set for the second scope of work.

b. WSS Set Development.

- (1) Follow DOE M 450.3-1, THE DEPARTMENT OF ENERGY CLOSURE PROCESS FOR NECESSARY AND SUFFICIENT SETS OF STANDARDS, to develop an adequate WSS Set. Additionally, refer to DOE G 450.3-1, DOCUMENTATION FOR WORK SMART STANDARDS APPLICATIONS: CHARACTERISTICS AND CONSIDERATIONS; and DOE-HDBK-1148-2002, WORK SMART STANDARDS USERS HANDBOOK, as supplemental guidance.
- (2) Minority Reports and Differences of Opinion.
 - (a) ID and Confirmation Teams are expected to engage in full and frank discussion of differences of opinion and strive to reach consensus on all issues. However, if a team is unable to reach consensus even after lengthy discussion, then majority rule or another decision-making process may be used instead. In this case, individual team members may submit a Minority Report if they believe the team's recommendation does not provide adequate ES&H protection or imposes standards that are disproportionate to the known hazards. The team forwards unresolved Minority Reports and accompanying team recommendations to the next level (e.g., Confirmation Team or Approval Authorities), or it follows the protocol for issue resolution that was established by the Convened Group.
 - (b) During the WSS Set development process, Stakeholders, subject matter experts (SMEs), and other interested parties who are not members of the ID Team, Confirmation Team, or Convened Group may review the proposed WSS Set and have concerns and issues. If one of these reviewers believes that the proposed WSS Set or revision/change would not provide adequate ES&H protection, that person may write up the issue as a "Difference of Opinion" and take it to the Process Leader for referral to the Confirmation Team or Approval Authorities. If the person is a DOE or contractor employee, the difference of opinion should be copied to his/her management chain at the same time that it is submitted to the Process Leader.
- (3) Opportunity to Comment. The Process Leader may elect to conduct one or more open forums that provide opportunity to solicit input from the other affected personnel in the contractor's organization and ORO on the content of the proposed WSS Set. The Process Leader schedules the comment session and reserves an appropriate meeting space. When possible, the Process Leader, ID Team members, and the COR coordinate distribution of the proposed WSS Set to the appropriate attendees a week in advance of the scheduled comment session. The Process Leader and ID Team attend the comment session to respond to questions from the attendees. The ID Team documents and resolves issues raised at the comment session, and the Process Leader distributes the resolution to everyone who signed in at the comment session.

- (4) Final Report. Each WSS Set referred for approval must be part of or accompanied by a Final Report that documents the process used and justifies the adequacy of the WSS Set. The Process Leader is responsible for developing this report, although sections of it may be prepared by the Convened Group, the ID team, or the Confirmation Team, as described below. The report should be as concise as possible, and no format is prescribed. These previously approved Final Reports may be of use as examples for new ID Teams to follow when writing their Final Report. At a minimum, the Final Report must include the following information:
- (a) A description of the scope and coverage of the WSS Set, including a description of the organization, site, and facilities covered; and the scope of the hazards or program areas addressed by the WSS Set. Include a list of any pertinent “out of scope” safety management system areas, hazards, or activities that are not included in the WSS Set, such as occurrence reporting, emergency management, fire protection operations, etc. Address the relationship and interfaces between the WSS Set and other standards sets that may have an impact on the site, such as the DOE/ORO Directives listed on List B or the requirements contained in an S/RID.
 - (b) A summary description of the work and the hazards, including appropriate references to existing documents where more complete information may be found. Include a description of the process used for determining the work and hazards.
 - (c) Instructions from the Convened Group, including any technical and management expectations and private industry benchmarks.
 - (d) A description of the structure of the WSS Set, including information on what the various elements are and how they interface with each other and with other areas related to integrated safety management.
 - (e) A statement that the most current versions of compliance agreements, regulatory enforcement actions, Safety Analysis Reports, Bases for Interim Operations, technical safety requirements, Authorization Agreements, permits, and procedures will be reviewed for consistency with the standards contained in the WSS Set, and these will control in the event of conflict until such time as any necessary modifications have been made through appropriate channels.
 - (f) A description of the degree and extent of Stakeholder involvement, and reports of any public meetings or other Stakeholder meetings held during the project.
 - (g) A description of the degree and extent of worker involvement.
 - (h) Reasons why the ID Team believes the WSS Set to be adequate and feasible to implement, including a discussion of the process used and how any established expectations and benchmarks are met.
 - (i) The identity and qualifications of the Convened Group, ID Team, and Confirmation Team. One method that has been successfully used to meet this requirement is to provide separate tables for the Convened Group and each team. Each table would

list the team member's name, affiliation (contractor or DOE), title, subject area for input to the WSS process, and a short professional biographical sketch.

- (j) The Confirmation Team report and recommendations, if a separate Confirmation Team is used.
 - (k) Unresolved Minority Reports from ID Team and Confirmation Team members.
- (5) Content of the WSS Set. The WSS Set must be included within or be accompanied by the Final Report. The WSS Set must include the following information in addition to the material required in the Final Report:
- (a) Standards sorted by the chosen structure (i.e, applicable Federal, State, and local laws and regulations, including DOE Rules) and clearly identified by the full number, title, and, where appropriate, version number with date. If individual sections or requirements from a standard are included rather than the whole standard, complete references to sources must be provided (e.g., number, title, section, paragraph, or text).
- NOTE:** A useful technique that increases the usability of the WSS Set has been to include (1) a table with the standards sorted by/matched to the hazards and (2) a list of standards according to type (e.g., Federal regulations, State regulations, DOE Directives, and voluntary consensus standards).
- (b) A clear statement of whether or not the most current versions of voluntary consensus standards listed in the WSS Set are to be used (versus the versions identified when the WSS Set was approved).
 - (c) A clear statement of whether or not standards incorporated by reference in voluntary consensus standards or DOE/ORO Directives listed in the WSS Set are to be performed to the referenced version or to the most current version.
 - (d) A clear statement of whether or not the most current versions of DOE/ORO Directives listed in the WSS Set are to be used (versus the versions identified when the WSS Set was approved).
 - (e) Applicability information. For each standard, define applicability within the contractor's organization to the extent practicable.
 - (f) Implementation Assumptions (IAs), where used.
 - (g) A statement that applicable Federal, State, and local laws are considered to be part of the WSS Set even if inadvertently omitted from the WSS Set list.
- (6) WSS Set Approval Process.
- (a) General. The Convened Group or the COR, if a Confirmation Team is used, determines the Approval Authorities for initial WSS Sets. Thus far, senior contract management and the ORO Manager have approved initial WSS Sets and some

revisions. However, approval authority has not been delegated to ORO for DOE HQ Office Of Nuclear Energy, Science and Technology (NE)-owned Category 1 Nuclear Facilities. The Approval Authorities should be scaled up or down as warranted by the scope and complexity of the proposed WSS Set and the desires of the DOE HQ program offices and/or the ORO Manager.

Based on the recommendation of the ID Team or, if used, the Confirmation Team, the approval authorities:

- Approve the WSS Set as proposed;
 - Disapprove the WSS Set and direct the ID Team to make identified revisions/changes before the WSS Set can be approved.
- (b) Contractor Approval. Contractor approval is a sign of endorsement of the content of the WSS Set and commitment to implement the standards contained therein. If a confirmation review was performed, contractor senior management approves the WSS Set after the Confirmation Team's review and recommendation for approval.
- (c) DOE Approval. The ORO Approval Authority designated by the Convened Group or the COR, if a Confirmation Team is used, approves initial WSS documents. DOE approval is a sign of endorsement of the content of the WSS Set and commitment to evaluate contractor performance against that WSS Set.

Approval of a WSS Set or changes thereto does not mean an associated exemption request from a Federal, State, or local law or regulation is approved. Approval processes for exemptions to laws and regulations are defined in the individual law or regulation. Furthermore, approval of a WSS Set and placement of the WSS Set in the contract does not constitute implementation. Refer to Paragraph 5c(5), of this Chapter, for more information on WSS Set implementation.

- (d) Contract Revision. After a WSS Set or revision/change is approved, it must be formally placed in the contract. Notification that the contract change will be made is included in the WSS Set approval letter, after which the WSS Set or revision/change is listed on List B at the next scheduled execution of a contract modification which includes an RCN (normally quarterly).
- c. WSS Set Maintenance. See Attachment 2, "*Guidance for Maintaining the Work Smart Standards Set*," of this Chapter.
- (1) General. WSS Sets are living documents and must be kept up-to-date to reflect current scope of work, hazards, missions, and expectations. Once an initial WSS Set is approved, it may need to be revised in response to a number of conditions.

Some of the changes will be significant and extensive; and others will be minor and narrowly focused. The change process is designed to provide positive document control and graduated review of revisions/changes depending on their complexity.

Either ORO or a contractor may identify the need for a change to a WSS Set. The appropriate personal should be contacted to justify the change

- (2) Submission of Updates. All WSS Set revisions/changes shall have a change or revision number in order to properly track and control the revisions/changes.
 - (a) WSS Set revisions/changes may be proposed at any time.
 - (b) Contractors must provide up-to-date hard copies of WSS Sets in a timely manner on request from ORO or DOE HQ.
- (3) Change Control Processes. The change control process for WSS Sets is designed to permit a streamlined process with limited evaluation for simple revisions/changes. It is the contractor's responsibility to make the changes. For all proposed changes, the contractor must provide an e-mail or a letter to the COR, and DMG that includes:
 - Description of magnitude and complexity of proposed change.
 - Justification of proposed change.
 - Schedule for completion of proposed change.
 - Lead point of contact for contractor efforts.
- (4) ORO Review and Response. The ORO process is managed as follows:
 - (a) The contractor formally transmits the WSS Set change package to the COR with a copy to DMG. The COR indicates approval or rejection by the letter associated with the change. The concurrence signature line on formal correspondence should always include the date of approval. The COR determines if the DPI should be informed and, if so, forwards a copy of the change package to the DPI.
 - (b) If the COR determines that additional time is needed to ensure a complete understanding of the impact of the proposed changes, the COR notifies the contractor in writing that the 30-day clock (which begins when the change package is received by DMG) has been stopped. The COR provides a copy of the letter to the DMG.

If the WSS Set revision/change affects a NE-Owned Category 1 Nuclear Facility (e.g., High Flux Isotope Reactor [HFIR]), then approval must be obtained from DOE HQ. The time line (e.g., the 30-day clock) is not applicable if DOE HQ approval is required. The COR must obtain a "target date" for HQ approval and provide it to DMG for tracking purposes.
 - (c) If the reviewers agree that the intended changes are acceptable and do not raise questions concerning the adequacy of the WSS Set, the COR concurs on the contractor letter and provides a copy to DMG.

- (d) If the reviewers disagree with some or all of the proposed changes, the COR provides formal notification to the contractor stating which portions of the proposal are accepted and which portions are rejected.
 - (5) Making the Change. The contractor makes the change by updating the master WSS Set and issuing a revision/change notice (hard copy or e-mail) to affected contractor organizations, the COR, and DMG. The contractor should send notification when the WSS Set is approved and updated; however, the contractor may elect to wait until the contract revision is made (i.e., via a contract modification which includes an RCN).
 - (a) Following approval by both parties, the Process Leader provides a copy of the approved WSS Set or revision and associated documentation to the COR with a copy to DMG. This includes the Final Report, any Differences of Opinion considered by the Confirmation Team or Approval Authorities, meeting notes, written or e-mail input from SMEs, qualification data for the ID Team (and Confirmation Team, if used), etc.
 - (b) After a WSS Set or revision is placed in the contract via a contract modification which includes an RCN, it is the list of contractually enforceable ES&H standards/requirements. WSS Set standards/requirements must be flowed down into contractor work control documents (e.g., programs, plans, procedures, documented work practices, etc.). Contractors must review their existing work control documents to determine if revisions are needed to comply with the WSS Set. Contractors are expected to maintain up-to-date information on the flowdown of the standards/requirements contained in the WSS Set into the work control documents. Contractors initiate implementation of WSS Set standards or portions thereof after their contracts organization receives a letter from the COR approving placement of the WSS Set into the contract.
 - d. WSS Sets on the Internet. The DMG Home Page contains links to WSS Sets that are posted on contractors' home pages.
6. REFERENCES.
- a. DOE M 450.3-1, DOE CLOSURE PROCESS FOR NECESSARY AND SUFFICIENT SETS OF STANDARDS, dated January 25, 1996.
 - b. DOE G 450.3-1, DOCUMENTATION FOR WORK SMART STANDARDS APPLICATIONS: CHARACTERISTICS AND CONSIDERATIONS, dated February 1, 1997.
 - c. DOE-HDBK-1148-2002, WORK SMART STANDARDS USERS HANDBOOK, dated February 1, 2002.
 - d. ORO O 250, Revision 8, STANDARDS MANAGEMENT PROGRAM, dated April 18, 2006, ALL CHAPTER, and any subsequent revisions.
7. DEFINITIONS. See Attachment 2 of ORO O 250, Chapter I, ORO STANDARDS MANAGEMENT PROGRAM OVERVIEW, of this Directive, for a glossary of terms used in the ORO Standards Management Program.

8. CONTRACTOR REQUIREMENTS DOCUMENT. See Attachment 1, Contractor Requirements Document.
9. ATTACHMENTS.
 - a. Attachment 1 - Contractor Requirements Document.
 - b. Attachment 2 – Guidance for Maintaining the Work Smart Standards Set.

CONTRACTOR REQUIREMENTS DOCUMENT

Contractors that develop and maintain Work Smart Standards (WSS) Sets must comply with Paragraph 5 of this Chapter and the following:

1. Ensure that the WSS Sets and their development/maintenance process meet the requirements of DOE M 450.3-1.
2. Appoint a central point of contact for processing WSS Set changes and notify Directives Management Group (DMG) of that person/organization.
3. Immediately upon approval of the WSS Set (but no longer than 30 calendar days) initiate a flowdown of standards/requirements contained in the WSS Sets into contractor procedures, plans, programs, and documented practices (i.e., Flowdown can begin prior to the issuance of a contract modification.).
4. Contractors must post their approved WSS Sets on their Internet home page and must maintain those electronic sets in up-to-date condition and provide access to Department of Energy (DOE) within 15 working days of any approved changes and notify DMG that the change has been completed.
5. Register on the DOE Directives and the DMG Home Page to receive notification of new and revised DOE/ORO Directives.
6. If the contractor's impact assessment states that a WSS Set revision effort is needed, the WSS Set change package is due to the COR, with a copy to DMG, within 90 calendar days from the date the Contracting Officer's Representatives (COR) requests an impact assessment. If additional time is needed, the COR must approve the schedule in advance.
7. If an implementation plan is necessary, see ORO O 250, Chapter VI, IMPLEMENTATION PLANS AND EXEMPTION REQUESTS, of this Directive.

GUIDANCE FOR MAINTAINING THE WORK SMART STANDARDS (WSS) SET

The following are items to consider when tailoring the change process.

1. Work and its hazards are dynamic. Static sets of requirements (even when carefully developed and fully complied with) cannot be relied upon indefinitely to provide assurance of safety. A number of conditions may indicate a need to revise the WSS Set or some portion thereof. Such conditions could include:
 - Changes in mission and work, or work conditions, resulting in a different set of hazards;
 - Discovery of new hazards or better understanding of existing hazards;
 - Input from Stakeholders, Interested Parties, or Departmental lessons learned that suggests the existing standards set may not be necessary and sufficient to adequately address all hazards;
 - Changes to laws, regulations, standards, or Department of Energy (DOE) Directives that are included in the WSS Set; and
 - Changes in contract or contractor.
2. Effective maintenance of the WSS Set requires continuing vigilance for change. Changes to mission, equipment, facilities, processes, materials, etc., may introduce new hazards. Changes to procedures, personnel or budgets may likewise introduce new circumstances that should be evaluated. New regulations, revision of standards or DOE Directives are also sources of changes that must be evaluated. Robust change control mechanisms are a requirement of Integrated Safety Management and WSS Sets should be controlled through these mechanisms. When changes are noted that may raise safety concerns, the WSS Set standards basis should be evaluated to determine if the WSS Set should be revised. In practice it is considered advisable that the WSS Set contain a standard for controlling the WSS Set. The guiding principle should be that a single standards change control mechanism for controlling all standards, including the WSS Set, should be established as part of the Integrated Safety Management System (ISMS).

Many of the above noted potential change conditions mirror the Necessary and Sufficient (N&S) Process initiation criteria that are stated in DOE M 450.3-1 and discussed in Section 7.1 of DOE-HDBK-1148-2002. These criteria apply not only to an initial application of the N&S Process, but also to subsequent conditions under which the N&S Process may be reinitiated. Change control, therefore, may often amount to reinitiating the N&S Process, although typically on a more limited scale.

3. Change control for a WSS Set should preserve or renew the integrity of the original N&S Process determination of adequacy and feasibility. By design, the N&S Process uses the collective expertise of carefully selected teams to reach a thorough understanding of the work and its associated hazards and to identify and confirm a set of standards that can be implemented to provide reasonable assurance of adequate protection from those hazards. If changes to the resulting WSS Set are not made with fidelity to the N&S Process, then the integrity of the entire standards set, and the assurance of protection that it

represents, may be compromised. "Replacement parts" for the WSS Set must be identified and considered with the same rigor that went into the original WSS Set. Documentation for the approved WSS Set should be sufficient to clearly identify the standards bases. When changes to the WSS Set are made, the WSS Set documentation should be revised to reflect the changes and the bases for those changes. This is of significant importance for maintaining the WSS Set.

4. At the same time, a WSS Set change control process should be simple enough to be readily usable within the existing organizational structure. An overly complex process or one which takes great effort to initiate will only invite disuse, with correspondingly negative impacts to the integrity of the WSS Set. While the change control process should include the basic elements of the N&S Process, it need not (and in most cases, should not) duplicate the scale and scope of the original N&S Process effort. Change control amounts to a focused application of the N&S Process, appropriate to the scope of the proposed change.
5. Change control for the WSS Set is an integral part of the ISMS. Establishment of an ISMS will include a hierarchy of documents to flow down contractual requirements for the work. A change control process is an expected component of such a document system. Since the same document hierarchy will also contain the WSS Set and lower-level requirements flowing from it, the change control process established as part of the ISMS should be designed to handle changes to the WSS Set as well as other site documents. Change control for the WSS Set is therefore not divorced from other site processes, but rather is an integral part of the ISMS.
6. Establishing fixed organizational responsibilities for change control allows change control to be accomplished in a routine manner while preserving fidelity to the N&S Process. And finally, the change control process should screen proposed changes on the basis of their safety significance, so that the system does not become clogged with items of low importance. It may be helpful to collect "minor" changes for periodic (for example, quarterly, semiannual) review by the appropriate team(s) rather than reviewing them individually, or to provide for streamlined processing of certain types of changes.
7. Identification (ID) Teams and Confirmation Teams always require input from contractor, line, workers, and Environment, Safety and Health (ES&H) professionals and from DOE line and ES&H professionals. If multiple work scopes are impacted, select a mix of representatives rather than having each organization provide a representative of each kind. If the Oak Ridge Office (ORO) ES&H professionals belong to different organizations, consider having representatives from each.
8. The need for a separate Confirmation Team depends on the complexity or potential controversy surrounding a particular proposed WSS Set change. Generally, extensive changes and those that involve the likelihood of differences of opinion on the resulting adequacy of the WSS Set would benefit from a separate Confirmation Team. If confirmation will be performed by the ID Team, be sure that the team includes people that do not have direct responsibility for the performance of the work.
9. The membership of the ID Teams and Confirmation Teams and the level of the Approval Authorities must be matched to the scope of work impacted by the potential WSS Set revision (e.g., project-wide, site-wide, or impacting multiple sites). Give consideration to current organizational structures and matrixed responsibilities within both DOE and the contractor.

10. Coordinate with other contractors when appropriate.
11. Select Approval Authorities at a level appropriate for the scope of the proposed WSS Set change. It is not necessary for the ORO Manager and the top contractor manager to approve every revision/change. However, the Approval Authorities must be high enough to ensure proper consideration of cross-cutting impacts. The following example was created for informational purposes:

<u>Revision/Change Impact</u>	<u>ORO</u>	<u>Contractor</u>
Site-Wide	Manager or COR	Manager or Director
Division Wide	COR	Division Manager
Program/Experiment	COR	Program Manager

NOTE: If the contractor has an approved site-wide or company-wide WSS Set, the WSS Set change effort for a project should focus on developing a project-specific Implementation Assumption to be added to the WSS Set.

12. In summary, an effective change control process should be characterized by the following:
 - The change control process should be a part of the organization's ISMS, as is the N&S Process.
 - The change control process should be implemented at an appropriate point in the N&S Process, typically after approval of the initial WSS Set.
 - The change control process should provide for screening of new inputs (for example, information about new work or changed hazards) to determine the need and appropriate mechanism for further action. Not all changes will require the same degree of attention. Minor administrative changes to existing standards could be issued with little review, while information about a new hazard may require more extensive review to identify appropriate standards.
 - The standards bases described in the documentation of the approved WSS Set should be used as the principal configuration control reference.
 - When changes to the WSS Set are made, the WSS Set documentation should be revised to reflect the changes and the bases for those changes.
 - The change control process should replicate the N&S Process, with roles and responsibilities that correlate to those in the N&S Process, to ensure that changes to the WSS Set are made deliberately and are adequately justified.
 - The change control process should be well-defined, so that potential changes can be handled "routinely," within a framework of defined tasks and responsibilities.

- The change control process should be managed by a single organization to ensure consistency and comprehensiveness in addressing potential changes.
- The change control process should be integrated with existing site mechanisms for documenting and promulgating standards so that changes can be communicated to those who use the standards in a timely fashion.
- The change control process should be integrated with existing processes and personnel responsibilities for contract modification.