



AMERICAN SOCIETY OF
SAFETY PROFESSIONALS

June 16, 2022

Office, Headquarters, U.S. Army Corps of Engineers
Safety and Occupational Health
441 G Street NW,
Washington, DC 20314

U.S. Army Corps of Engineers (USACE) Safety and Health Requirements Manual (EM-385) Occupational Safety and Health Programs for Federal Employees

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Per direction of the April 14th Federal Register announcement, we submit the following correspondence and attached materials to address the following:

The U.S. Army Corps of Engineers (USACE) Safety and Health Requirements Manual (EM 85–1–1) is the gold standard for Safety and Occupational Health regulations. The manual holds a long history dating back to 1941 and is designed to facilitate the standardization of all safety programs. The EM 385–1–1 prescribes the safety and health requirements for all Corps of Engineers activities and operations. The USACE is soliciting comments on the [proposed revisions to EM 385–1–1](#). USACE intends to update the manual and periodically thereafter, to reflect such public input, experience, and innovation. The agency will address significant comments received in the next revision of this manual.

Introduction

The [American Society of Safety Professionals \(ASSP\)](#) is the oldest society of safety professionals in the world. Founded in 1911, we represent over 36,000 professionals advancing workplace safety and health in every industry, in every state and around the globe. ASSP members have set the occupational safety and health (OSH) community's standards for excellence, ethics and practice for more than 100 years.



Working together for a safer, stronger future.® | assp.org



ASSP 2020 Correspondence Review

The USACE EM-385 document is widely used and respected by ASSP members and occupational safety and health professionals. This submission is intended to offer some overall technical materials and background materials that might be of assistance during finalization of the document. These comments are also in addition to comments we submitted to USACE addressing the EM-385 document in January 2020.

Our comments in January 2020 noted the following overall in its comments.:

- 1. ASSP supports the overall change in direction in EM-385 to include and enhance new developments in occupational safety and health management and risk management and assessment. This change in direction will move USACE occupational safety and health forward and we are pleased to see this change in direction. While we have some specific technical comments, the Society supports this new direction. The key issue will be the importance of combining effective compliance program with integrated risk assessment.*
- 2. The USACE continues to include and enhance recognition of the implementation and use of voluntary national consensus standards. USACE emphasis on the ANSI/ASSP Construction/Demolition Standards, and the Fall Protection/Arrest Standards, represent cutting edge OSH practices and equipment. ASSP has long been on record supporting this inclusion and USACE use of these standards is a good model for other public sector agencies and organizations. Our position on the use of consensus standards will be submitted as part of the ASSP technical comments.*
- 3. ASSP commends the ongoing efforts of the USACE to further professionalize the practice of safety management. Further enhancement and inclusion of the Site Safety and Health Officer (SSHO), Hazardous, Toxic, and Radioactive Waste (HTRW) Projects), Site Safety and Health Manager (SHM), and recognition of safety professionals as defined under the ANSI/ASSP Z590.2 Standard are important steps to move the OSH profession forward. ASSP also has a position on certification, which has been included with these comments.*
- 4. High caliber OSH programs, regardless of industry, requires planning, process improvement, and organizational leadership. The new additions to Section #2 address the importance of prior planning. ASSP created and published an American National Standard addressing pre-planning for construction and demolition operations that should be recognized by the USACE, [ANSI/ASSP A10.1].*

Our original January 2020 comments have also been attached to this statement as an appendix.





Credentiailling and Certification Issues

In addition, ASSP has also been contacted by a number of members and other occupational safety and health organizations asking for insight on the inclusion of appropriate OSH professionals in EM-385. ASSP has a long-standing position on the issue of certifications and credentials. Our position is as follows:

ASSP takes the following position:

- *ASSP is a strong supporter of high-caliber certification bodies and has historically supported certifications and credentials*
- *ASSP does not oppose the public sector from issuing certifications*
- *We recommend that certification bodies operate at the highest levels and that they obtain accreditation from an NCCA-recognized accrediting body or an equivalent*
- *Public-sector certification bodies must recognize and include accredited certification bodies in the private sector in regulations and programs*

ASSP commends the ongoing efforts of the USACE to further professionalize the practice of safety management. Further enhancement and inclusion of the Site Safety and Health Officer (SSHO), Hazardous, Toxic, and Radioactive Waste (HTRW) Projects, Contractor Safety and Health Manager (SHM), and recognition of safety professionals as defined under the ANSI/ASSP Z590.2 Standard are important steps to move the OSH profession forward."

Please note that the original comments were submitted in 2020, but it is worth noting that the Z590.2 is now sunseting. We also suggest that the Army Corps of Engineers consider inclusion of the [INSHPO Competency Framework](#), [Note: Attached as a separate document as an appendix]. This is of value for consideration by the Army Corps of Engineers due to the number of countries, via their professional OSH organizations, having declared support for this framework via the "[Singapore Accord](#)".

The Framework provides a foundation piece for the development of international standards for OHS practice. It promotes a high standard of capability among OHS Professionals and Practitioners, and in turn, informs employers and regulators of their roles and capabilities. The sections on knowledge and skills provide benchmarks for education and training bodies and OHS professional associations as they develop educational programs, continuing professional development and certification and designation schemes.





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ANSI/ASSP National Voluntary Consensus Standards

ASSP would also like to recognize and thank the USACE for its contributions to OSH management and improvement through its efforts to improve this manual, its interaction with the development of voluntary national consensus standards, and its participation with professional safety organizations such as ASSP.

The USACE does an outstanding job of recognizing and including voluntary national consensus standard, including important ANSI/APPS Standards. If USACE staff would like to review the ANSI/ASSP Standards listed in our comments, please advise ASSP and we can provide you with a copy of the standard.

Our Z490 Committee for occupational safety and health training did review the proposal, and offered additional comments and insights in addition to our original comments from 2020:

#25-2020: " USACE: 01.B Indoctrination and Training. A Competent Person (CP), qualified in the material presented, shall conduct all training required by this manual. All training shall correspond to American National Standards Institute (ANSI) regulation Z490.1.

The Army Corps should be commended for their recognition of the Z490 Standard since it is widely used and respected. Such recognition is appropriate and represents good public policy and will help move occupational safety and health forward.

We do note the following as an informational update for the Army Corps, which should also further support and buttress this inclusion and recognition.

Z490.1 and z490.2 are now being combined in a new version z490.1. We are considering a change of Z490.1 to Z490.0, but that has not yet been decided or finalized.

New language in the proposed revision of Z490 supports, the term of "competent Person" as a qualified trainer and competent training professional. We may revise this term in future revisions of the standard. If approved, we will provide the Army Corps of Engineers with an update and status.

The z490 committee is working hard to get this standard published by Q1 2023. We also note that the Army Corps of Engineers has been active on the Z490 Committee and this support and activity is very much appreciated.





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ADDITIONAL TECHNICAL COMMENTS

Please see our specific technical comments below, and we would be pleased to have additional discussion with USACE OSH Professional Staff if you should see such a need.

Finally, if requested, ASSP stands ready to apprise our membership of this proposed revision. Our members have significant interest in this manual, and we believe the Society can proactively and positively contribute.

Thank you for your time and attention to our comments. If we can be of any assistance in this matter, please feel free to contact ASSP.

Respectfully Submitted,

Brad D. Giles, P.E., CSP, STS, FASSP
President, ASSP

Submitted Appendix Materials:

- ASSP Position Statement on the Role of Consensus Standards in Occupational Safety and Health
- ASSP Professional Issue Paper and Professional Issue Paper and Position for Professional Certification Legislation and Regulation
- January 2020 ASSP Correspondence to the USACE Addressing EM-385
- Singapore Accord and INSHPO Competency Framework as a standalone file

The primary staff contact if you should have any questions is listed below:

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POSITION STATEMENT ON THE ROLE OF CONSENSUS STANDARDS AND GOVERNMENTAL REGULATIONS IN OCCUPATIONAL SAFETY AND HEALTH

**Approved by the ASSP Board of Directors
August 25, 1995, Reaffirmed June 2008 and June 2011**





June 2018, Reaffirmed With ASSE/ASSP Name Change

POSITION STATEMENT ON THE ROLE OF CONSENSUS STANDARDS IN OCCUPATIONAL SAFETY AND HEALTH

The utilization of national consensus standards will be of increased importance to this country as the economy of the United States moves towards more of a global perspective. National consensus standards reflect the opinions of the professionals who work at all levels of the public and private sectors in technology development, manufacturing, training, financial analysis, personnel, academia as well as insight from the final end user. This balanced insight enables standards to be crafted in a way which not only benefits and protects users of the standard, but also furthers the interests of the businesses which have been created to meet user demand.

ASSP supports the increased utilization of consensus standards in the formulation of legislation and regulation for occupation safety and health. Governmental agencies such as OSHA, CPSC, NHTSA, etc... should be encouraged to utilize these consensus standards as they provide an efficient/effective alternative to traditional public sector rule making.

Policy Implementation

ASSP advocates initiatives to encourage the utilization of national consensus standards as an effective/efficient option for meeting the demand of increased regulation/legislation in occupational safety and health since:

- National consensus standards have fewer procedural burdens
- The consensus method provides for a balance between competing interests
- The voluntary nature of consensus standards enables users to adapt provisions to meet unusual circumstances.
- Much lower standards development cost are obtained.

(Supporting white paper enclosed)





WHITE PAPER ON THE ROLE OF CONSENSUS STANDARDS AND GOVERNMENTAL REGULATIONS IN OCCUPATIONAL SAFETY AND HEALTH

Preface

The American Society of Safety Professionals acknowledges a responsibility to take an active role in the evolution of national policy with respect to safety and health standards and regulations. At all times, and especially in times of political reform, there is a need for government to receive the counsel of the safety and health community with respect to standards development and promulgation.

As we review over three (3) decades of social legislation and its enforcement under EPA, OSHA, CPSC, etc., Congress and the professional safety and health community are again raising questions as to what the role of occupational safety and health standards and regulation should be. Some legislators have proposed a more comprehensive program of standards and enforcement. Others have maintained that the proper place for standards development and enforcement is within the national consensus standards-setting framework. Others have supported a performance-oriented approach to safety and health standards.

While this paper primarily focuses upon occupation safety and health standards and regulation, the positions set forth here can be applied generically to other regulatory areas. Essentially the uses of national consensus standards in the regulatory process, unless warranted by legislation already in place, should be pursued along the lines suggested in the various venues of this paper.

Introduction

To obtain a legislative compromise one of whose objectives was to avoid delays that were inevitable if regulations were developed under the provisions of the Administrative Procedure Act, the Occupational Safety and Health Act of 1970 required the newly formed Occupational Safety and Health Administration (OSHA) to promulgate safety and health regulations using existing nationally recognized consensus standards. While this action did serve the congressional intent of quickly establishing a set of regulations for OSHA to enforce, it also resulted in the adoption of hundreds of regulations that were of minimum value in protecting workers. Although OSHA has done much to eliminate such nuisance regulations, enforcement of regulations with questionable value in the 1970's resulted in resentment from industry that lingers even today.

Yet another problem in OSHA's rapid adoption of consensus standards as regulations was that advisory provisions of voluntary consensus standards became mandatory provisions of government regulations. In other words, not only was the voluntary standard made into a mandatory regulation, but many advisory provisions that used the word "should" were made into mandatory provisions when OSHA replaced the word "should" with "shall." The result was that some regulations were, as a practical matter, impossible





to fully comply with. Many OSHA regulations were changed to address such concerns, but the experience seems to have damaged OSHA's reputation and credibility.

These developments also impacted the conduct of consensus standards committees. Many committees revised standards to clarify the original intent of provisions, more explicitly addressed exceptions to general provisions, narrowed the scope of the standards or otherwise reacted to developments at OSHA. Even today, members of consensus standards committees look beyond conveying general principles and concepts and concern themselves with exceptions to the rule, adverse impact on specific industries, legal implications of standards, and the potential for misinterpretation. Thus, as a result of OSHA and other factors¹, the development and maintenance of consensus standards related to occupational safety and health has become a much more complicated and demanding endeavor.

Given that OSHA regulations now exist, and given the cost and complexity of developing and maintaining consensus standards, one may question the value of consensus standards activities. Should consensus standards be withdrawn if they cover areas also covered by OSHA regulations? If so, what would happen if OSHA is eliminated? If no, what value is the consensus standard providing? What role should consensus standards play in occupational safety and health? What functions must be reserved for regulation?

To the above end this paper examines the proper role of consensus standards and government regulation in occupational safety and health. After describing the role of consensus standards to occupational safety and health, this paper concludes with a description of policies of the American Society of Safety Professionals intended to enhance this role.

Discussion

The Value of Consensus Standards Generally

When compared to government regulation, consensus standards have several advantages, including the following:

- fewer procedural burdens;
- consensus method;
- voluntary nature allows users to adapt provisions to meet unusual circumstances;
- much lower development cost.

These advantages lead to authoritative documents that can be quickly developed and modified, appeal to common sense, are flexible in application, and are cost effective when compared to the federal regulatory process.

It is important to note that the concept of consensus and the input of most, if not all, materially interested parties is critical to the consensus system. Care must be exercised in the makeup and organization of



consensus committees to assure the integrity of the process. Without these attributes the validity of a consensus standard is suspect.

When Government Regulation is Required

As previously stated, the validity of consensus standards is based on achieving consensus among all materially interested parties. It follows that government regulation is probably necessary when consensus cannot be achieved in the voluntary standards process, or when the voluntary standards process does not receive input and consider the views of all materially interested parties.

Government regulation is also required when a higher level of validity or greater objectivity is required for enforcement. Such may be a watershed issue for industry as OSHA is legislatively and administratively reformed. If industry wants high objectivity (i.e. little or no discretion or interpretation by OSHA compliance officers), then detailed and comprehensive regulations must exist. On the other hand, if industry wants less regulation and greater flexibility, then industry should consider greater application of voluntary standards in enforcement decisions made by OSHA compliance officers using their professional judgment. Given the appeal provisions allowed under OSHA this trade off appears worthwhile.

A potential danger in increased use of consensus standards is that the process will become targeted by special interests. However, viewed another way, increased use and application of consensus standards by OSHA will motivate increased participation in the consensus process and thereby increase the quality and validity of consensus standard related to occupational safety and health. While the "political" intensity of the process may increase, each party in the process will proceed with the understanding that (1) consensus does not require unanimity, and (2) failure to reach consensus may result in federal regulation.

The Value of Consensus Standards in Areas Addressed by Government Regulations

A practical concern to resource-limited standards developers is the extent to which support should be continued for consensus standards in areas addressed by government regulation. Consensus standards related to safety and health are perceived as less acceptable when OSHA regulations address the same issue, but nevertheless provide the following benefits:

- consensus standards can provide a useful "how to" supplement to OSHA regulations;
- consensus standards can influence revisions to OSHA regulations;
- unlike OSHA, consensus standards can address off-the-job safety and health issue;
- consensus standards address new issues and incorporate updated scientific information quickly while OSHA proceeds with its rulemaking process;





- consensus standards can provide a valuable reference for safety and health evaluations in cases where OSHA regulations have become outdated.

The Relationship Between OSHA Regulations and Consensus Standards

What the preceding discussion suggests is that a complementary relationship should exist between OSHA regulations and consensus standards. As a matter of policy, OSHA should take advantage of valid consensus standards and use them in enforcement, mindful of the fact that consensus standards are not written to address every foreseeable circumstance. OSHA will spend less money developing regulations, and, armed with common sense, consensus standards, and reasonable discretion, OSHA compliance officers can do their job more effectively. For the consensus standards developer, OSHA regulation can provide an alternative to stalemate when consensus cannot be achieved. In addition, such action is also in accordance with the approved, reaffirmed, and revised Office of Management and Budget Circular A-119 Federal Participation in the Development and Use of Voluntary Standards (See Appendix B). For those almost unresolvable issues of standards setting, the ASSP recommends more use of the negotiated rulemaking option as critical safety and health standards need to be available.

ASSP Supports Consensus Standard Alternatives to Federal Regulation

ASSP encourages support of consensus standards activities and processes as an alternative to government regulation of occupational safety and health whenever conditions permit. When compared to government regulation, consensus standard activities allow for greater participation by ASSP professionals in the development of safety and health practices. Also, since consensus standards do not profess to address every possible situation, ASSP professionals also have greater influence in the application and interpretation of consensus standards than they do with federal regulations.

Implications for OSHA Reform

ASSP encourages support of OSHA reforms that foster the use of consensus standards in enforcement when a standard does not exist, is inadequate, or is obsolete/dated. For safety professionals/practitioners to realize greater opportunities to apply their professional skill and judgement, consensus standards must, in some sense, be authoritative. Without such authority, safety and health professionals may not have sufficient influence and resources to properly do their jobs. For consensus standards to be authoritative, OSHA must be able to routinely rely on provisions of consensus standards in enforcement.

Since national consensus standards do not contemplate every possible scenario, there exists a need for interpretation of the standards based upon professional judgement. When such standards are used in the regulatory enforcement process, federal/state agencies should rely primarily, although not exclusively, upon the view of those who wrote the standards. Facilitation of agency needs should be provided promptly in a collegial manner.





ASSP's View of Government Regulation

While government regulation appears fundamental to safety/health standardization, it should, nevertheless, be efficient, participative, and centralized. The regulated community will more likely view these characteristics as a value-added process where they are encouraged to provide input. Having regulations developed centrally reduces the need for each jurisdiction to prepare their own standards. Having multiple standards bodies presents many difficulties for the regulated community that has facilities in many jurisdictions.

Standards need to be written for the regulated community to readily understand and implement. If standards were more clearly written, compliance directives would not be needed as an interpretation would be obvious. Standards often appear written more for ease of enforcement or to help the solicitors prevail in legal proceedings. Enabling legislation may be necessary, in this situation, to achieve the desired results.

These regulatory standards often have some requirements which have little to do with achievement of safety and health objectives. Some of this may result from OSHA's approach in writing standards in a one-size-fits-all style. These standards should require only what is necessary to achieve a reasonable reduction in risk. Layers of documentation and written certifications are often extras that add compliance burden with little safety/health accomplishment. If enabling legislation is needed to obtain these results, such action may be necessary.

- Standards, developed by OSHA or any agency, need a user panel review before they are published in final form. Enabling legislation or appropriate regulation may be required to obtain this result.
- Standards covering similar issues in the same Part or across different Parts of OSHA standards should have the same requirements, unless the hazards are very different.
- OSHA should have an active process to review standards and update them on a five (5) year cycle after a period of experience in application to harmonize them with the more current consensus standards.
- The standards making/regulatory process should factor in a requirement to allow visits of sites/personnel in the regulated community at any time in the development of a standard to review how issues proposed or being developed for regulation are currently being managed and the costs of managing these issues.

The above features should be put forth or considered as desirable tasks of rule-making when legislators or regulators move toward development of such regulatory standards.





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Conclusion

The ASSP supports a complementary relationship between OSHA regulations and consensus standards related to occupational safety and health which uses valid consensus standards enforcement, mindful of the fact that consensus standards are not written to address every foreseeable circumstance. ASSP points out that action of this nature may empower and enhance the professional stature of both ASSP members and OSHA compliance officers. Most importantly, such action will allow for a more efficient and responsive use of occupational safety and health resources thereby improving working conditions.

To further set in place the Society's view of national consensus standards per se Appendix A is provided. This policy position was approved by the Board of Directors on March 5, 1990. In essence the position looks at consensus voluntary standards apart from regulations while covering the range of issues involved in effective participating in the uniquely American system of standards making.





October 5, 2018

ASSP PROFESSIONAL ISSUE PAPER AND POSITION PROFESSIONAL CERTIFICATION LEGISLATION

Issue: There is a growing trend to create credential transparency, reveal the credential marketplace, increase credential literacy, and empower everyone to make more informed decisions about credentials and their value. This trend is impacting federal and state policy as well as education and job training providers.

Strategic Issues: ASSP's strategic plan notes:

ASSP is the preferred source for education among safety professionals, providing valuable training, networking, knowledge, skills and continuing education.

Grow and diversify professional development revenue sources.

Improve OSH professionals' knowledge, skills and abilities by increasing the number of OSH professionals who have earned an ASSP certificate.

Increase the number of ASSP members who hold OSH-related accredited professional designations.

Society Background: The Society has historically taken the position to recognize professional certifications issued by an organization approved by the [National Commission for Certifying Agencies](#) (NCCA).

ASSP takes the following position:

- ASSP is a strong supporter of high-caliber certification bodies and has historically supported certifications and credentials
- ASSP does not oppose the public sector from issuing certifications





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- We recommend that certification bodies operate at the highest levels and that they obtain accreditation from an NCCA-recognized accrediting body or an equivalent
- Public-sector certification bodies must recognize and include accredited certification bodies in the private sector in regulations and programs

Approved ASSP Governmental Affairs Committee: September 2018

Approved ASSP Council on Professional Affairs – September 2018

Approved ASSP Board of Directors – October 2018



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January 1, 2020

Headquarters, U.S. Army Corps of Engineers, (USACE)
Safety and Occupational Health Office
Attn: Mr. Steven Washington,
Washington, DC

Occupational Safety and Health Programs for Federal Employees
Safety and Health Requirements Manual (EM 385-1-1)

Dear Mr. Washington:

The American Society of Safety Professionals is pleased to submit comments for the record addressing the proposed revisions to the U.S. Army Corps of Engineers (USACE) EM-385 Occupational Safety and Health (OSH) Program.

ASSP will submit its comments to the USACE in accordance with the published submission requirements. However, ASSP would like to note its overall comments on the proposed changes overall:

1. ASSP supports the overall change in direction in EM-385 to include and enhance new developments in occupational safety and health management and risk management and assessment. This change in direction will move USACE occupational safety and health forward and we are pleased to see this change in direction. While we have some specific technical comments, the Society supports this new direction. The key issue will be the importance of combining effective compliance program with integrated risk assessment.
2. The USACE continues to include and enhance recognition of the implementation and use of voluntary national consensus standards. USACE emphasis on the ANSI/ASSP Construction/Demolition Standards, and the Fall Protection/Arrest Standards, represent cutting edge OSH practices and equipment. ASSP has long been on record supporting this inclusion and USACE use of these standards is a good model for other public sector agencies and organizations. Our position on the use of consensus standards will be submitted as part of the ASSP technical comments.
3. ASSP commends the ongoing efforts of the USACE to further professionalize the practice of safety management. Further enhancement and inclusion of the Site Safety and Health Officer (SSHO), Hazardous, Toxic, and Radioactive Waste (HTRW) Projects, Site Safety and Health Manager (SHM), and recognition of safety professionals as defined under the ANSI/ASSP Z590.2 Standard are important steps to move the OSH profession forward
4. High caliber OSH programs, regardless of industry, requires planning, process improvement, and organizational leadership. The new additions to Section #2 address the importance of prior planning. ASSP created and published an American National Standard addressing pre-planning for construction and demolition operations that should be recognized by the USACE, [ANSI/ASSP A10.1].

ASSP would also like to recognize and thank the USACE for its contributions to OSH management and improvement through its efforts to improve this manual, its interaction with the development of voluntary national consensus standards, and its participation with professional safety organizations such as ASSP.

The USACE does an outstanding job of recognizing and including voluntary national consensus standard, including important ANSI/APPS Standards. If USACE staff would like to review the ANSI/ASSP Standards listed in our comments, please advise ASSP and we can provide you with a copy of the standard.

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Please see our specific technical comments below, and we would be pleased to have additional discussion with USACE OSH Professional Staff if you should see such a need.

Respectfully Submitted,

Diana Stegall, CSP, ARM
President, ASSP

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ASSP TECHNICAL COMMENTS
Occupational Safety and Health Programs for Federal Employees
Safety and Health Requirements Manual (EM 385-1-1)

ASSP does have some specific technical comments for review by the USACE. Our comments are organized by the specific section in the manual and address proposed changes to the EM-385 Manual:

USACE: (1) *The Contractor shall identify each major phase of work that will be performed on this contract. Within each major phase, all activities, tasks or Definable Features of Work (DFOWs) shall be identified that will require an Activity Hazard Analysis (AHA).*

ASSP: Moving from a compliance model to an integrated risk-based approach is the single most impactful policy shift the USACE is making. A risk-based approach takes a systemic view of an organization, proactively identifying, assessing, mitigating, and communicating risk levels (with both strengths and opportunities). This approach requires safety leadership and constant vigilance in targeting and eliminating workplace hazards. Risk-based approaches have been refined and widely adopted all over the world (many originating in Europe, South Korea, Australia, New Zealand, etc.) and have been shown to be more effective than simple compliance with local and federal laws in reducing injuries, illnesses and fatalities. It will be important to also balance the issues of compliance versus risk assessment. Risk assessment is not an excuse to regulatory non-compliance. Regulatory compliance combined with risk assessment is what is required to meet the requirements of EM-385.

USACE: d. *The Contractor or USACE Project shall establish a SOH deficiency tracking system that lists and monitors the status of SOH deficiencies in chronological order. The tracking system provides useful information that must be used to evaluate the effectiveness of the APP. A monthly evaluation of the data should be discussed in the OC or SOH meeting with everyone on the project.*

ASSP: The Society supports the direction and intent of this addition, but it might be difficult to have a monthly data driven evaluation. Depending on the issue being reviewed and evaluated, the data might yet not even be available. We suggest there be a clarification that data evaluation needs to be based on its quality and availability.

USACE: (1) *The Contractor shall identify each major phase of work that will be performed on this contract. Within each major phase, all activities, tasks or Definable Features of Work (DFOWs) shall be identified that will require an Activity Hazard Analysis (AHA).*

ASSP: High caliber OSH programs, regardless of industry, requires planning, process improvement, and organizational leadership. The new additions address the importance of prior planning. ASSP created and published an American National Standard addressing pre-planning for construction and demolition operations that should be recognized by the USACE, [ANSI/ASSP A10.1].

USACE: 01.A.14 Contractor Risk Management Process. Risk management is a business process that includes the identification, assessment, and prioritization of risks, followed by coordinated and economical application of resources to minimize, monitor, and control the probability and/or impact of unfortunate events to an acceptable level. The USACE uses the Activity Hazard Analysis (AHA) as part of a total risk management process. > See Figure 1-2 for a NON-MANDATORY formatted outline of an AHA. An electronic version AHA may be found on the HQUSACE Safety Office Website.





Note: Contractors and other individual employer's typically use Job Safety Analyses (JSAs), Job Hazard Analyses (JHAs), or similar Risk Management assessment tools. These documents are considered equivalent to, and acceptable substitutes for, the USACE's AHA provided the data collected is the same as that required by the AHA. USACE's AHA provided the data collected is the same as that required by the AHA.

ASSP: Moving from a compliance model to an integrated risk-based approach is the single most impactful policy shift the USACE is making. A risk-based approach takes a systemic view of an organization, proactively identifying, assessing, mitigating, and communicating risk levels (with both strengths and opportunities). This approach requires safety leadership and constant vigilance in targeting and eliminating workplace hazards. Risk-based approaches have been refined and widely adopted all over the world (many originating in Europe, South Korea, Australia, New Zealand, etc.) and have been shown to be more effective than simple compliance with local and federal laws in reducing injuries, illnesses and fatalities

ASCE: d. AHA's are intended to be developed and used by the field crews/workers performing the work, with the assistance of others (SSHO, OC, Superintendent, etc) as needed. The initial, accepted AHA shall be provided to and used by the field crews/workers that are performing that activity. AHAs are to be considered living documents and are intended to be created in the field and updated by the workers as needed.

ASSP: The Society supports this addition since our contention is that all levels of the organization need to be involved in the risk assessment process so that hazards and exposures are correct identified and remediation techniques then selected and implemented. Such techniques should be based on the Hierarchy of Controls. The ASCE approach is also consistent with the existing ANSI/ASSP/ISO risk management and risk assessment standards. If ASCE is interested in reviewing these standards we will provide the documents to appropriate staff.

USACE: (3) The names of the Competent Person(s) (CP) and Qualified Person(s) (QP) required for a particular activity (e.g., confined space entry, scaffolding, fall protection or other activities as specified by OSHA/this manual) shall be identified and included in the AHA, as well as proof of their competency/qualification.

ASSP: The Society supports this addition since our contention is that competence in occupational safety and health for OSH Professionals, which included CP's and QP's needs to be enhanced. We are not sure if including qualifications and credentials is required on the AHA, but we are pleased the USACE sees the need to document competence and ability for these persons to meet their professional accountabilities and responsibilities.

USACE: 3) If the SSHO has a Third-Party, Nationally Accredited (ANSI or National Commission for Certifying Agencies - NCCA) SOH-related certification, only 4 years of experience is needed. > See Appendix O for list of certifications.

ASSP: The Society notes the USACE has placed more emphasis on technical and professional competence for OSH Professionals in this revision. ASSP supports these enhancements. ASSP supports legislation and regulations to ensure that critical workplace safety and health responsibilities are performed or managed by qualified professionals. However, ASSP opposes legislation or regulation not including accredited certification(s) or licensure. This would include, but is not limited to, the certified safety professional (CSP) and certified industrial hygienist (CIH), or those individuals qualified by experience, education or training to perform such responsibilities. Appendix Q addresses this issue with the addition of the certifications listed above. Our one suggestion is that the USACE also consider





including certification bodies accredited under the CESB (Council on Engineering and Scientific Specialty Boards).

USACE: 01.B Indoctrination and Training.

01.B.01 A Competent Person (CP), qualified in the material presented, shall conduct all training required by this manual. All training shall correspond to American National Standards Institute (ANSI) regulation Z490.1.

ASSP: We remain strongly in favor of this requirement and recognition of the quality and value of the ANSI/ASSP Z490.1 Standard. Safety training is most effective when it is developed using a systematic approach that encompasses program management, content development, and training delivery, evaluation and documentation. Safety training is an essential element of any effective OSH program. Employers should provide frequent training to ensure that employees have the knowledge, skills and abilities they need to work safely. It's important to identify and avoid hazards while continuously improving performance. The most effective training follows a systematic approach that incorporates adult learning principles, multiple modes of learning and hands-on exercises. The ANSI/ASSP Z490.1 standard provides guidance on how to manage overall safety training programs, as well as criteria for developing training that incorporates adult learning principles. Learn to deliver training effectively, evaluate the outcomes and application of training on the job, and document the training to maintain compliance with company policies and regulatory mandates.

In addition, it should be noted that ASSP recently published the ANSI/ASSP Z490.2 Standard for virtual training. The [ANSI/ASSP Z490.2](#) standard provides guidance on accepted practices specifically for e-learning in safety, health and environmental training programs. Perhaps, the USACE will consider recognizing both Z490.1 and Z490.2 for virtual training.

The scope of Z490.2 is: *This standard establishes criteria for electronic learning (hereafter referred to as e-learning) as part of safety, health and environmental training programs, including program management, development, delivery, evaluation and documentation. This standard is intended to complement ANSI/ASSP Z490.1, Criteria for Accepted Practices in Safety, Health and Environmental Training. As such, all criteria in ANSI/ASSP Z490.1 apply. Only criteria unique to or particularly relevant to e-learning are presented in this standard.*

USACE: 01.E.01 Emergency Plans to ensure employee safety in case of fire, inclement weather or other emergency shall be prepared, in writing, and reviewed with all affected employees. Emergency plans shall be tested to ensure their effectiveness.

ASSP: We do not have any significant concerns with this section since it is relatively unchanged from earlier renditions. We do note that ASSP publishes an A10 Standard addressing emergency planning and we have received inquiries from stakeholders looking for more information in support of regulation from the USACE and other agencies such as OSHA. There might be some interest in proving recognition of the standard for those stakeholders looking for more technical information:

ANSI/ASSP A10.26-2011 (R2016) Emergency Procedures for Construction and Demolition Sites

Scope: *This standard applies to those emergency procedures involving: fires, collapses, hazardous spills and other emergencies that could endanger workers; emergency rescue of injured or ill workers or other persons or of uninjured workers unable to rescue themselves; onsite provision of first aid and emergency medical care; evacuation and transportation of injured or ill workers to appropriate emergency medical facilities; pre-planning and coordination of emergency plan with emergency medical facilities; training on emergency procedures/plans for workers and other groups.*

USACE: 02.A General. Employers shall establish and maintain hygienic sanitation provisions for all employees in all places of employment.





ASSP: We do not have any significant concerns with this section since it is relatively unchanged from earlier renditions. We do note that ASSP publishes an A10 Standard addressing sanitation and we have received inquiries from stakeholders looking for more information in support of regulation from the USACE and other agencies such as OSHA. There might be some interest in proving recognition of the standard for those stakeholders looking for more technical information:

ANSI/ASSP A10.25-2017 Sanitation in Construction

Scope: *This standard applies to all construction and demolition jobsites and covers potable water, toilet and hand-washing facilities located on a jobsite. This standard does not apply to the handling of hazardous chemicals. The employer shall provide washing facilities that conform to the specifications of Safety Data Sheet (SDS) for hazardous product handling used on the job site.*

USACE: 05.C.01 The employer shall evaluate the workplace for noise hazards initially and regularly during the course of work. When noise hazards are known or expected, the employer shall develop a Hearing Conservation Program that includes identification and assessment of noise hazards and the measures to be taken to protect personnel against them.

a. USACE workplace hearing conservation programs shall comply with the requirements of ER 385-1-89.

b. Contractors programs shall comply with American Conference of Governmental Industrial Hygienists (ACGIH) Threshold Limit Values (TLVs) and this manual at a minimum.

ASSP: We do not have any significant concerns with this section since it is relatively unchanged from earlier renditions. We do note that ASSP publishes an A10 Standard addressing hearing loss prevention. We have received inquiries from stakeholders looking for more information in support of regulation from the USACE and other agencies such as OSHA. There might be some interest in proving recognition of the standard for those stakeholders looking for more technical information:

ANSI/ASSP A10.46-2013 Hearing Loss Prevention for Construction and Demolition Workers

Scope: *This standard applies to all construction and demolition workers with potential noise exposures (continuous, intermittent and impulse) of 85 dBA and above. It is intended to help employers prevent occupational hearing loss among construction and demolition workers.*

To address this issue, we recommend that a “c” option per below:

c. Contractors looking for program implementation assistance should review the ANSI A10.46 Standard for Hearing Conservation Programs.

USACE; (1) The contractor shall develop an HCEP in accordance with this Section as well as all requirements of 29 CFR 1910.147, ANSI Z244.1, and ANSI A10.44. This HCEP shall be submitted as part of their Accident Prevention Plan (APP) to the GDA for acceptance.

ASSP: The Society continues its support of the recognition and inclusion of both Z244.1 and the A10.44 Standards. Recent advances in control system technologies provide an excellent opportunity to improve upon the current requirements in terms of both safety and productivity for machinery, equipment or processes. The key issue is that both Z244 and A10.44 require an assessment, which is more than consistent with the direction and intent of EM-385.





USACE: Section 16: Load Handling Equipment

ASSP: The ANSI/ASSP A10.22 Standard is referenced in this section as ASSE A10.22. ASSP requests this section be revised with the reference corrected to the ANSI/ASSP A10.22 Standard.

USACE: Section 21 - Fall Protection

21.B.01 Fall Protection Program Manager (Program Administrator per ANSI Z359.2). The Program Manager is responsible for the overall development, implementation, monitoring and evaluation of the Fall Protection Program. This person can also function as a OP, CP, CP trainer, OP trainer and/or competent rescue trainer if so trained. The Program Manager shall:

21.C.01 Training of all personnel involved in the Fall Protection Program – The Program Manager, OPs, CPs, End Users, Authorized and Competent Rescuers, as well as any associated fall protection trainers – shall be as described in ANSI/ASSE Z359.2, Minimum Requirements for a Comprehensive Managed Fall Protection Program, and shall conform to ANSI/ASSE Z490.1, Criteria for Accepted Practices in Safety, Health and Environmental Training. The refresher for all personnel involved in the fall protection program shall also be in accordance with requirements prescribed in ANSI/ASSE Z359.2 standard.

ASSP: The Society supports recognition of our Z490.1 and Z359.2 Standards and comments the USACE for its efforts to move fall protection management forward. The citations should be updated to ASSP instead of ASSE since the name of the organization changed in June of 2018.

However, we believe additional and stronger support is required to emphasize the need for organizations to develop and implement an overall comprehensive fall protection management program. Organizations with multiple sites, or whose workers encounter diverse fall protection/restraint hazards and exposures have asked ASSP for more guidance in managing an overall fall protection management program.

Such a program should also be part of an overall OSH management system, which we know is an effective approach to reducing workplace risks, protecting workers and improving business outcomes worldwide. From our review, it appears that is the intent and direction of the EM-385 Manual Revisions.

We do recommend the USACE compare the revised requirements in EM-385 versus guidance published in the first iteration of USACE Publication *Lifeline* in order to maintain consistency. USACE incorporated the enforcement of the ANSI Z359 standard for fall protection during Calendar Year 2014. This has led to numerous inquiries to the Society asking if ASSP approves fall protection training programs. Our response has been that ASSP supports this ongoing recognition of Z359.2 and its training requirements in EM-383. However, we are not an approval organization for contractors and their training programs.

Of interest is ASSP recently created a Managed Fall Protection Certificate Program and the response has been very positive. Fall protection/restraint is specifically noted in both the ANSI/ASSP Z10 Occupational Health and Safety Management Systems Standard and in the newly approved American adoption of the ISO 45001 (OHSMS) Standard.

USACE: 21.F.01 Standard Guardrail Systems.

ASSP: We have been contacted in the past by stakeholders and constituents looking for more technical information to augment the USACE requirements for guardrail systems. Our suggestion is that USACE consider recognizing the A10.18 and A1264.1 Standards as technical references.





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ANSI/ASSP A10.18-2007 (R2012) Safety Requirements for Temporary Roof and Floors, Holes, Wall Openings, Stairways and Other Unprotected Edges

Scope: The purpose of this standard is to establish reasonable and practical safety requirements to protect employees and the public from falls through temporary roof and floor holes, wall openings, stairways, active and inactive leading edges and other unprotected edges

ANSI/ASSP A1264.1-2017 Safety Requirements for Workplace Walking/Working Surfaces and Their Access; Workplace, Floor, Wall and Roof Openings; Stairs and Guardrail/Handrail Systems

Scope: This standard sets forth safety requirements in industrial and workplace situations for protecting persons in areas/places where danger exists of persons or objects falling from elevated walking and work surfaces such as floor, roof or wall openings, platforms, runways, ramps, fixed stairs or roofs in normal, temporary and emergency conditions.

USACE: 21.H.07 Inspection of safety nets.

a. Safety nets shall be inspected by a CP in accordance with the manufacturer's instructions and recommendations

ASSP: We have been contacted in the past by stakeholders and constituents looking for more technical information to augment the USACE requirements for netting systems. The Society has had a number of inquiries (approximately 50), about USACE and netting standards. Our suggestion is that USACE consider recognizing the A10.11 and A10.37 Standards as technical references.

ANSI/ASSP A10.11-2010 (R2016) Safety Requirements for Personnel Nets

Scope: This standard establishes safety requirements for the selection, installation and use of personnel nets during construction, repair and demolition operations.

ANSI/ASSP A10.37-2016 Debris Net Systems Used During Construction and Demolition Operations

Scope: The purpose of this standard is to provide the criteria for debris net selection and use and to provide design, test and installation requirements for debris nets.

USACE: d. Self Retracting Devices (SRDs). The SRDs shall meet the requirements of the ANSI/ASSE Z359.14 standard.

(1) A Self-retracting lanyard (SRL) is a device mounted or anchored such that the arrest distance shall not exceed 2 ft (60 cm), and the average arrest force shall not exceed 1,350 lbs (6 kN) or a maximum peak force of 1,800 lbs (8 kN). The SRL is only used for vertical applications.

(2) An SRL with leading edge capability (SRL-LE) is designed for applications where during use, the device is not necessarily mounted or anchored overhead and may be at foot level and where the possible free fall distance from the edge is up to 5 ft (1.5 m) and the average arrest distance shall not exceed 4.5 ft (1.37 m). The device is equipped with an energy absorber to withstand impact loading of the line with a sharp or abrasive edge during fall arrest and for controlling fall arrest forces on the worker.

ASSP: We appreciate and support recognition of the standard and believe this recognition for the hazard and exposure being addressed.





ASSP is currently revising this standard. The Z359.14 Standard addresses self-retracting devices used in occupations requiring personal protection against falls from heights and applies to the manufacturers, distributors, purchasers and authorized persons who use such equipment. Self-retracting devices shall be classified according to dynamic performance as follows: Class A: Maximum arrest distance of 24 inches (610 mm), Class B: Maximum arrest distance of 54 inches (1372 mm).

It is important to note the ANSI/ASSP Z359.14-2014 standard test procedures for SRL-LE devices requires drop tests over a sharp structural steel edge. Test requirements for concrete, stone, steel decking or other materials are not included in the testing requirements in the current version of the ANSI/ASSP Z359.14 standard and testing of such equipment is outside the scope of the standard. The material of the leading edge may render some SRL-LE devices ineffective and in some cases, damage or sever the line constituent.

As recommended in the general operating guidance of the standard, if an end-user is using equipment along any edges not covered by the standard, it would be prudent to discuss the work application with the manufacturer and to confirm that the use of an SRL-LE has been validated by the manufacturer for the specific application.

Any decision on the use of fall protection equipment needs to be based on a complete risk assessment and equipment selection process conducted within the parameters of the requirements listed in the ANSI/ASSP Z359 Fall Protection Code and its accompanying standards.

USACE: 21.N.06 *Rescue equipment used for self-rescue or assisted-rescue (i.e. SRL with rescue capability) shall meet ANSI Z359.4 and Z359.14.*

ASSP: We appreciate and support recognition of the standard and believe this recognition for the hazard and exposure being addressed is appropriate for inclusion in EM-385.

USACE: (1) Only full body harnesses meeting the requirements of ANSI Z359 are acceptable. Full body harnesses labeled to meet the requirements of the ANSI A10.14 shall not be used.

ASSP: We appreciate and support recognition of the standard and believe this recognition for the hazard and exposure being addressed. The warning on A10.14 is appreciated and appreciated. We would suggest some additional language indicating that A10.14 has not been a current American National Standard since 2002 is warranted.

USACE: 22.A.01 *Scaffolding and work platforms shall be erected, used, inspected, tested, maintained, and repaired in accordance with:*

a. *For non-mechanized equipment - ANSI A10.8, Scaffolding Safety Requirements, or the Scaffolding, Shoring, and Forming Institute's Code of Safe Practices, and the manufacturer's operating manual.*

ASSP: We appreciate and support recognition of the standard and believe this recognition for the hazard and exposure being addressed. Our review of the EM-385 changes indicates synergy between the proposed edits and the current A10.8 Standard. Since the original approval of the A10.8 standard in 1969, scaffolding work has evolved considerably as materials, components and technology have changed, allowing for a wider variety of scaffolding options for use on work sites.

That variety is why the standard includes requirements for several different types of scaffolding materials and designs, including platforms, hoisted suspended scaffolds, system scaffolds, tube and coupler scaffolds, and form and carpenter bracket scaffolds.





Whichever type of scaffolding is used, ensuring that it will serve its intended purpose and keep workers safe begins in the planning phase.

Of importance is that A10.8 defines a qualified person as “one who, by possession of a recognized degree, certificate or professional standing, or who by extensive knowledge, training or experience has successfully demonstrated the ability to solve or resolve problems relating to the subject matter, the work or the project.” Beyond having a qualified person overseeing the design, it’s important to closely exam the work site to ensure that workers will be able to do their jobs safely during all phases of scaffolding assembly, use and disassembly.

In addition to establishing safety requirements for scaffolding equipment, A10.8 includes training requirements to ensure that workers understand and recognize the hazards associated with working on scaffolding and know the procedures to follow to minimize those hazards.

The standard specifies that employers must provide training for each employee on site-specific hazards and that they understand the correct procedures for erecting, securing, inspecting, maintaining and disassembling the scaffolding systems in use.

USACE: *a. An Explosives Safety Site Plan (ESSP), approved by DoD Explosives Safety Board (DDESB), IAW DA Pam 385-64 and DA Pam 385-65, is required prior to the placement of explosives on site or the start of explosives-related operations.*

ASSP: The Society has received approximately seventy-five inquiries over the years asking if the ANSI/ASSP A10.7 Standard can be used in the preparation of the required plan. Our response in the past has been affirmative but needs to be consistent with other referenced documents. Our belief is that the standard should be used as a reference tool. Our recommendation is that the USACE include the standard in this section as an appropriate reference document to use when creating an explosives site plan.

ANSI/ASSP A10.7 - 2018 Safety and Health Requirements for Construction and Demolition Use, Storage, Handling and Site Movement of Commercial Explosives and Blasting Agents

Scope: The purpose of this standard is to provide the construction industry with reasonable minimum recommendations for establishing and maintaining a level of health and safety with regard to the transportation, storage, handling and use of commercial explosives and blasting agents.





USACE: 34.A.01 Confined Spaces – Non-Marine Facilities. Confined space (CS) work performed in permanent, fixed facilities and/or performed on construction sites shall be performed in accordance with this Section, 29 CFR 1910.146 and ANSI Z117.1.

ASSP: The society appreciates and commends recognition of Z117.1 in EM-385. We do suggest that the ANSI/ASSP A10.43 Standard also be included in this section above. It is specifically applicable to construction and is consistent with Z117.1.

ANSI/ASSP A10.43-2016 Confined Spaces in Construction and Demolition Operations

Scope: The purpose of this standard is to establish minimum requirements and procedures for the safety and health of employees who work in, in connection with, and around (in such proximity that would affect employees) confined spaces on construction and demolition projects

USACE: 1. Accident Prevention Plan (APP) - General. An APP is a safety and health policy and program document that is contract- or job- specific. It is an integral part of the planning process. > See Section 01 and 01.A.12.

(2) A copy of the contractor’s project-specific, accepted APP shall be available on the work site. See ANSI/ASSE A10.38 for programmatic issues.

ASSP: The society appreciates and commends recognition of A10.38 in EM-385. The Society supports the USACE efforts to include more cutting-edge management approaches and techniques.

EM-383 appears to be tying the importance of risk assessment to management approaches. This is a concept support ASSP. One impactful way to move toward a risk-based approach would be to require all employers to implement a safety and health program (SHP), which USACE appears to be doing with these revisions. SHPs are management systems that focus on core elements of management leadership, worker participation, hazard identification and assessment, hazard prevention and control, education and training, and program evaluation and improvement. This comprehensive approach to hazard assessment and control directs organizations to “find and fix” hazards, thus minimizing the need for other prescriptive and burdensome regulations that tie up OSHA’s resources.

ASSP contends that data and research findings demonstrate that such programs are effective in lowering incident rates, strengthening employee relations and improving workplace processes. We have seen claims by the U.S. Occupational Safety and Health Administration (OSHA) that implementation of SHPs will reduce injuries by 15% to 35% for employers who do not currently have safety and health programs. SHPs manage the full risk picture by employing a systems-level methodology, thereby avoiding the myopic after-the-fact perspective that occurs when focusing only on injury and illness rates.

USACE: 3. APP Format. The following areas are typically addressed in an APP, but besides being job-specific, the APP shall also address any unusual or unique aspects of the contract or job for which it is written. The non-mandatory Accident Prevention Plan (APP) Checklist, Form A-2 (or similar), may be used to ensure each area of required information has been provided. See ANSI A10.33 for multi-employer projects.

ASSP: ASSP: The society appreciates and commends recognition of A10.33 in EM-385. The Society supports the USACE efforts to include more cutting-edge management approaches and techniques. The standard defines the duties and responsibilities of construction employers working on projects with multiple employers. This standard has been a staple of the construction and demolition industry for several decades and has been included in many contracts, work agreements, and citation by reference in state/federal regulations. We know from member response that safety professionals use the A10.33 standard as a guideline to provide a safe and healthy work environment. USACE inclusion of the standard is significant since we have had several hundred inquiries in the past ten years asking for insight and tools to address multiemployer worksites.





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USACE: 1. Public Safety. Requirements for work area delineation, traffic control devices, and the use of flag persons shall be considered and as per ANSI A10.34. Public service announcements shall be used as needed to promote safety of the public exposed to USACE activities. Barriers and fencing shall be considered in restricting the public from operation sites. It is also necessary for all contact with the public to be handled in a courteous manner. See ANSI A10.34.

ASSP: The society appreciates and commends recognition of A10.34 in EM-385.

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