



# Consensus Standards Improve Your OSH Performance

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# What are we talking about today?

## Key Questions:

- How do OSH professionals use consensus standards?
- What is the relationship between industry consensus standards and regulatory standards?
- What are some common issues and concerns with using these standards?

# What are we talking about today?

## Our Agenda

### Learning Objectives

- Review ANSI/ASSP voluntary national consensus standards and how they are used to mitigate OSH hazards and exposures
- Develop capabilities to use these standards to identify work-related hazards and exposures and hazardous working conditions
- Explain the relationship between consensus standards and federal regulations, and develop an understanding of how to coordinate your efforts related to them

# What do we use to form the basis for decisions?

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# What is a consensus standard?

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Voluntary consensus standards are guidance documents that reflect the collaborative expertise of member organizations and representatives

The resources are developed through a *rigorous* process and must be approved

# How are standards developed?

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**Topic is approved /  
may begin with a  
tech report**



**Committee is  
selected**



**Document is  
written**



**Committee votes /  
input is provided /  
document is edited**



**Committee  
approves –  
secretariat seeks  
ANSI approval**



**Every 5 years –  
reviewed**

May be revised or  
reaffirmed

Important – KNOW the  
YEAR of the standard you  
are referencing – it  
should be current

# Role of a Standards Developing Organization

- American Society of Safety Professionals (ASSP)
  - ASSP manages the process – accredited by ANSI and operates under ANSI requirements
  - Committee representatives
    - from industry, academia, government, insurance, etc.
    - may include non-ASSP members or OSH professionals
  - ASSP works to verify the ANSI “Essential Requirements” (procedures) are met and consensus is reached
  - Raise awareness on the use and value of standards
  - Promote implementation of standards

# What is the role of ANSI?

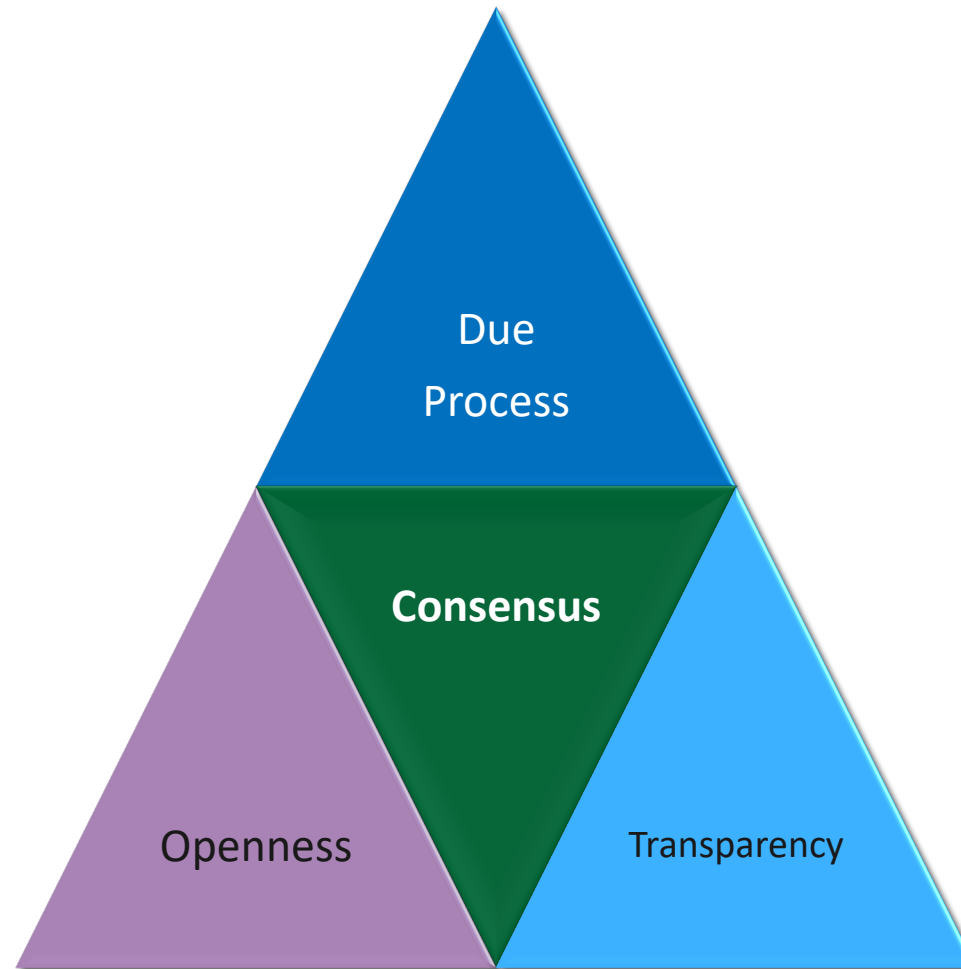
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- Provide oversight and process/procedures for all standard development organizations to follow including:
  - Committee balance
  - Ballot process
  - Comment resolution processes
- If all processes and procedures are followed, the organization submits paperwork for ANSI approval

If you see the ANSI approval on any standard, you can be confident you are referencing a consensus standard

# Cardinal Principles of the ANSI System

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## How to Interpret a Standard Name

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- ANSI/ASSP Z117.1-2016 Safety Requirements for Entering Confined Spaces
  - ANSI – Approval body
  - ASSP – Secretariat
  - Z117.1 – Number associated with the standard
  - 2016 – Year published
  - Safety Requirements for Entering Confined Spaces – topic

# Standards and More Standards...

In the U.S. alone, there are more than 95,000 recognized standards

These documents are being developed by

- more than 450 standards developing organizations (SDOs), with the twenty largest of these organizations producing approximately 80% of the standards
- at least 150 consortia
- hundreds of committees addressing the technical requirements of standards

# Key Players in Standards Development

ANSI

American National Standards Institute – coordinating body

ASME

American Society of Mechanical Engineers

ASSP

American Society of Safety Professionals

ASTM

American Society of Testing and Materials

ISEA

International Safety Equipment Association

NFPA

National Fire Protection Association

# Tech Reports

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Registered with  
ANSI



Not a standard - no  
“shall” statements

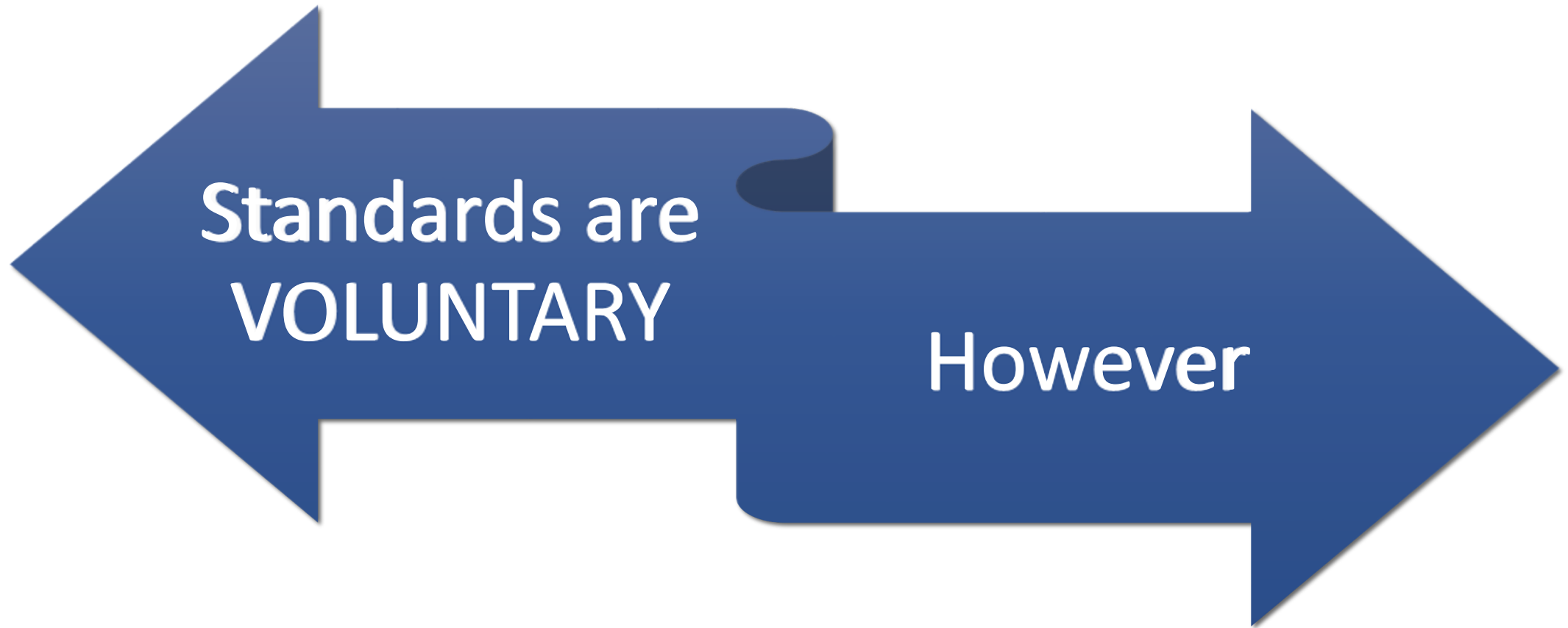


Provides guidance

- What is it?
- Quicker to develop
- Provides guidance where no standard exists
- Recommendations to improve a newly-identified safety aspect
  - TR Z15.3 *Management practice for the safe operation of partially and fully automated motor vehicles*
- May be a pre-cursor to a standard
  - Z590.3 *Prevention thru Design*

# Compliance and Enforcement

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# ANSI Standards

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- The following language is included in almost all ANSI standards:

**“The use of American National Standards is completely voluntary; their existence does not in any respect preclude anyone, whether he/she has approved the standards or not, from manufacturing, marketing, purchasing, or using products, processes, or procedures not conforming to the standards.”**

# National Voluntary Consensus Standards

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How they are developed

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How they are used

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Philosophy

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What is meant by voluntary if an accident occurs?

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Relation to compliance (more to come on that)

# National Voluntary Consensus Standards Who Cares???

How are these standards used?

Are these standards used only for litigation?

How are such standards used by OSHA and other regulatory agencies?

Why should OSH Professionals be interested and hopefully participate on committees?

# Standards vs Law

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Simply claiming to meet “OSHA Standards” or “European Standards” may be a *negative* for many knowledgeable users who are aware laws are slow to change



ANSI standards, as mentioned, go beyond regulatory requirements



Note: it is critical to KNOW the version of the standard (year) referenced

Maintain but do not use old standards  
Understand the differences in requirements of the new revisions

# How Standards Impact the Profession

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Continually challenge and improve the body of knowledge

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Go beyond regulations (that are slow to change)

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To be used as a reference to support occupational safety and health (OSH) professionals in their role to protect workers

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May be used for legal cases

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Augment regulations (e.g. Z15.1 and FMCSR)

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Promote standardization



# The Role of Government

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- In the U.S., no single federal government agency has control over national voluntary consensus standards.
- Each government agency determines which standards meet its needs. (NIST – National Institute of Standards and Technology overall coordinator).
- An agency is responsible for determining whether a private sector standard already exists that is appropriate for its needs.
  - If so, they will use the private sector standard.
  - If not, the agency is expected to work with the private sector to develop the needed standard.

# ASSP Standards Secretariats (Administrator)

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A10 - Construction  
and Demolition  
Operations

A1264 – Floors and  
Walkways (Slips  
and Trips)

Z9 - Ventilation

Z15 - Motor  
Vehicle Operations

Z117 – Confined  
Spaces

Z244 –  
Lockout/Tagout  
(protective  
equipment)

Z359 – Fall  
Arrest/Fall  
Protection

# ASSP Standards Secretariats (cont'd...)

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Z10 OSHMS (Safety Management Standard)

Z490 (Safety and Health Training)

Z390 Hydrogen Sulfide Training (H2S)

Z590 – The Safety Professional

ISO TC 262 Risk Management (ISO 31000)

ISO TC 283 – Occupational Health & Safety Management

ISO 45001

# More Touch Points

Know your clientele – these people know the difference between standards and the law

Ways to connect – writing technical materials, participation at US safety and health events

YOU need to know the difference between the standards and the law – know the different versions

Know the differences between certification, accreditation, and third-party verification

# Let's talk Management Systems

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**ANSI/ASSP/ISO 45001-2018**

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**Occupational Health and Safety Management Systems**

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**ANSI/ASSP Z10.0-2019**

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**Occupational Health and Safety Management Systems**

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**Huhhhhhhhhhhhhhhh.....????????????????????????????**

# Global Toll

- 2.3 million people killed by work accidents and disease
- 6,300 deaths per day (one every 15 seconds)
- 317 million non-fatal work accidents
- 160 million people with occupational disease
- ~ 4% of world GDP = work accidents and diseases

Source: ILO

# ISO 45001

The clauses map those in other international standards:

- Scope
- Normative References
- Terms and definitions
- Context of the organisation
- Leadership [and worker participation]
- Planning
- Support
- Operation
- Performance evaluation
- Improvement

# Z10-2019

1. Scope, Purpose and Application
2. References
3. Definitions
4. Context of the Organization – Strategic Considerations
5. Management Leadership and Worker Participation
6. Planning
7. Support
8. Implementation and Operation
9. Evaluation and Corrective Action
10. Management Review

Annex A – ANSI/ASSP Z10.0 Explanatory and Advisory Text

Annex B – Bibliography

# Differences – ISO 45001 Versus Z10

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Please review this website. OSHA put out this publication showing some of the differences with the applicable voluntary national consensus standards.

It shows some of the primary differences and applications.

[https://www.osha.gov/shpguidelines/docs/Crosswalk\\_to\\_Voluntary\\_OSHA\\_Standards\\_7-3-18.pdf](https://www.osha.gov/shpguidelines/docs/Crosswalk_to_Voluntary_OSHA_Standards_7-3-18.pdf)



# Questions?

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