

American Society of Safety Engineers

Professional Development Conference June 24-27, 2007

Session No. 101F

BASIC SAFETY MANAGEMENT ELEMENTS

Joel N. Tietjens, CSP, CSHM
President
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American Society of Safety Engineers

BASIC SAFETY
MANAGEMENT
ELEMENTS



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BASIC ELEMENTS

What are the elements that make up an effective basic safety management plan?

- Management/Policy
- Recordkeeping
- Loss Analysis
- Safety & Health Education/Training
- Safety & Health Inspections/Surveys
- Accident/Incident Reporting & Investigations
- Plan & Programs Review



MANAGEMENT

MANAGEMENT





MANAGEMENT

- The employer has the responsibility of providing a workplace free of any recognized hazards
- A successful safety management plan must rest on a solid foundation of management commitment and support

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MANAGEMENT

- Is there a difference between commitment and support?
- Commitment
 - To pledge or assign to some particular course or use
- Support
 - To provide resources
 - Uphold, advocate, champion

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MANAGEMENT

 Management must thoughtfully and thoroughly develop a <u>safety and health</u> <u>policy</u> that can be <u>understood</u>, <u>believed</u> and <u>sets</u> the tone for action.



MANAGEMENT

- Does management understand what the policy means?
- The policy should be short, sweet, and to the point. Preferably approximately a half page.
- To be effective, management must establish challenging (realistic) goals for that particular organization/industry.

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MANAGEMENT

- Must assign responsibility (with authority) and hold accountable personnel for implementing the plan
- Must participate in safety forums, meetings, educational processes
- Management must "walk the talk"

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RECORDKEEPING

RECORDKEEPING



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RECORDKEEPING

- What records should be retained and why?
- Occupational Safety & Health Administration (OSHA) requires that employers with more than ten (10) employees maintain records.



RECORDKEEPING

• If the employer has ten (10) or less employees, they must maintain records if they have been requested to participate with the Bureau of Labor Statistics (BLS) in their annual survey of occupational illnesses and injuries.



RECORDKEEPING

- Records serve as a source of support for managing the safety management plan. May be beneficial in strengthening other safety management programs. Loss/trend analysis
- Records can serve as support during legal or other evidentiary proceedings.

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RECORDKEEPING

- Management should determine what records should be retained and for what period of time. For example:
 OSHA requires OSHA 300 Logs be retained
 - OSHA requires OSHA 300 Logs be retained for a period of five (5) years, plus current year.
- Management should designate a person(s) to maintain what records and where.

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RECORDKEEPING

- Records kept should be
 - OSHA 300, Log of Work-Related Injuries and Illnesses
 - OSHA 300A, Summary of Work-Related Injuries and Illnesses



RECORDKEEPING

- Accident/incident reports & investigations (OSHA 301, Injury and Illness Incident Report)
- State reports
- First aid

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RECORDKEEPING

- Property damage/losses
- Liability losses
- Motor vehicle liability/damage/losses/ maintenance
- **Security losses**
- Inspections/surveys
- Safety meetings or other related meetings



RECORDKEEPING

- Education/training records
- Equipment inspection/maintenance
- What retention period for each would be sufficient?
- What other records should be retained?

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LOSS ANALYSIS

LOSS ANALYSIS





LOSS ANALYSIS

- What is loss analysis?
- The means of studying statistical data (favorable and/or unfavorable) to determine trends or identify problem areas
- Why do loss analysis?
- Mistakes or errors result in damaged products, production delays, or employee accidents/incidents that effect profit

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LOSS ANALYSIS

- Two (2) basic types
 - Trend
 - Job Safety Analysis (JSA)



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LOSS ANALYSIS

- Trend
 - Used to identify trends indicated by statistical data gathered from other program components
 - Accident/incident data
 - Inspection/survey data
 - Indicate where problem areas exist and where to allocate limited resources

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LOSS ANALYSIS

- Conducting a Trend Analysis
- Select the data to be analyzed
 - Injury, inspection/survey, etc. data
- Determine time period
 - Monthly, quarterly, annually
- Identify similarities
 - Injuries, job functions, etc.
- Develop corrective actions



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LOSS ANALYSIS

- Job Safety Analysis (JSA)
 - Identifying the hazard associated with a job task and applying measures to protect the employee(s) or to eliminate or control (minimize) the hazard

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LOSS ANALYSIS

- Solutions could include
 - Physical changes
 - Machine guards, process layout, etc.
 - Change in procedures
 - The way the job is performed, etc.



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LOSS ANALYSIS

- Management should designate a person(s) responsible for conducting the analysis
- Including time frames and job tasks



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SAFETY & HEALTH EDUCATION/TRAINING





EDUCATION/TRAINING

- Safety & health education/training is provided to minimize and/or eliminate unsafe acts (behaviors) while performing tasks
- Used to identify hazards involved in tasks, as well as, procedures to avoid them



EDUCATION/TRAINING

- Who should receive education/training?
- Management
 - Line
 - Middle
 - Senior



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EDUCATION/TRAINING

- Employees
 - New hires
 - Transferred
 - Continual
 - Temporary
- Contractors?



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EDUCATION/TRAINING

- How often should education/training be provided?
- Depending on the complexity of the subject and regulatory requirements
 - Quarterly
 - Semi-annually
 - Annually
 - Bi-annually
 - Tri-annually





EDUCATION/TRAINING

Seven (7) Steps to Education/Training

- 1. Determine if education/training is needed to solve the problem
- 2. Identify the education/training need
- 3. Identify the goals and objectives
- 4. Develop learning activities
- 5. Conduct the education/training
- 6. Evaluate education/training effectiveness
- 7. Improve the process



EDUCATION/TRAINING

- All training should be properly documented
- Who conducts the education/training process?



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INSPECTIONS/SURVEYS

- Inspections and surveys can be a <u>proactive</u> tool in identifying hazards and behaviors before the losses occur.
- Inspections and surveys can also be a <u>reactive</u> tool, such as a thorough inspection after an accident or incident has occurred to determine what else could go wrong.



INSPECTIONS/SURVEYS

- When to conduct inspections/surveys may be
 - Daily
 - Weekly
 - Monthly
 - Quarterly
 - Semi-annually
 - Annually
 - Special needs, i.e., plant turnarounds, nonroutine activities, etc.
 - Follow-up



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INSPECTIONS/SURVEYS

- Who should do the inspections/surveys?
 - Employees
 - Line managers
 - Mid managers
 - Safety & health staff
 - Safety committee
 - Insurance carrier
- Who else?



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INSPECTIONS/SURVEYS

- Inspections/surveys should be properly documented
 - Checklists
 - Narratives
 - Follow-ups



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ACCIDENT/INCIDENT

ACCIDENT/INCIDENT
REPORTING &
INVESTIGATIONS





ACCIDENT/INCIDENT

- Why report and investigate?
- Determine the cause
- Uncover indirect incidents causes
- Prevent similar incidents
- Document facts
- Cost information
- Promote safety & health
- Fact Find <u>NOT</u> Fault Find



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ACCIDENT/INCIDENT

- Items to identify
 - Reporting requirements and procedures for both the employer and employees
 - Training?
 - Personnel responsible for investigations
 - Who should investigate
 - Guidelines for how to conduct a thorough investigation
 - Training?

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PLANS & PROGRAMS

PLAN & PROGRAMS AUDIT/REVIEW



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PLAN & PROGRAMS **AUDIT/REVIEW**

- The purpose of auditing or reviewing the safety management plan and its programs is to keep it working efficiently and effectively in preventing accidents, injuries, and other losses.
- Does the plan and its programs keep pace with the ever changing operating environment?



PLAN & PROGRAMS **AUDIT/REVIEW**

- Determine who will conduct the audit/review
- How often will the audit/review be conducted?
 - At least annually



PLAN & PROGRAMS AUDIT/REVIEW

- Documentation
 - All audits/reviews should be properly documented with the findings and the necessary actions to be taken.



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SEVEN GUIDING PRINCIPLES

SEVEN GUIDING
PRINCIPLES TO
INTEGRATED
SAFETY
MANAGEMENT
(ISM)



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INTEGRATED SAFETY MANAGEMENT

- 1. Workforce Responsibility and Accountability
 - Line management is responsible and accountable for the protection of employees, the public, and the environment. Everyone is responsible and accountable for the safe conduct of their activities.



INTEGRATED SAFETY MANAGEMENT

- 2. Clear Roles, Responsibilities and Authorities
 - There are clear roles and lines of responsibility, authority, and accountability at all levels of the organization to ensure protection of employees, the public, and the environment.

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INTEGRATED SAFETY MANAGEMENT

- 3. Competence Commensurate with Responsibilities
 - All employees have the experience, knowledge, skills, and abilities needed to perform their work safely and competently.







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INTEGRATED SAFETY MANAGEMENT

- 4. Balanced Priorities
 - Management will allocate resources to address safety, programmatic, and operational considerations. No work will be performed unless it can be performed safely.

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INTEGRATED SAFETY MANAGEMENT

- 5. Identification of ES & H Standards and Requirements
 - Hazards shall be evaluated and appropriate controls implemented before work is performed to provide adequate protection to employees the public, and the environment.



INTEGRATED SAFETY MANAGEMENT

- 6. Hazard Controls Tailored to Work Being Performed
 - Engineered and administrative controls shall be in place to prevent and control work-associated hazards.



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INTEGRATED SAFETY MANAGEMENT

7. Work Authorization

 No work will be performed unless it can be shown to be done safely.
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CORE FUNCTIONS

- Define the Scope of Work
 - Missions are translated into work, expectations are set, tasks are identified and prioritized, and resources are allocated





CORE FUNCTIONS

- Analyze the Hazards
 - Hazards are
 associated with the
 work identified,
 analyzed, and
 categorized



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CORE FUNCTIONS

- Develop and Implement **Hazard Controls**
 - Applicable standards and requirements are identified. and agreed-upon, controls to prevent/mitigate hazards are identified, the safety envelope is established, and controls are implemented



CORE FUNCTIONS

- Perform Work Within Controls
 - Readiness is confirmed and work is performed safely



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CORE FUNCTIONS

 Provide Feedback and **Continuous Improvement**

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 Feedback information on the adequacy of controls is gathered, opportunities for improving the definition and planning of work are identified and implemented, line and independent oversight is conducted, and, if necessary, regulatory enforcement actions



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IN SUMMARY

IN SUMMARY



IN SUMMARY

- To create an effective basic safety management plan, the organization must have these elements
 - Management/Policy
 - Recordkeeping
 - Loss Analysis
 - Safety & Health Education/Training
 - Safety & Health Inspections/Surveys
 - Accident/Incident Reporting & Investigations
 - Plan & Programs Review

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T-JENS & T-JENS

Joel N. Tietjens, CSP, CSHM

President

T-JENS & T-JENS, INC.

18803 Whitewood Drive

Spring, TX 77373-5613

Off: 281/353-3680

Fax: 281/288-6952

E-mail: Joel@tjens.com

Web: www.tjens.com



