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DRAFT STANDARD
Z1000
Occupational Health and Safety Management

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Preface

This is the first edition of CSA Z1000, *Occupational health and safety management system*. This Standard has been developed to provide the basic structure that organizations can use in developing and implementing an occupational health and safety management system. It is intended that the use of this Standard would encourage a more systematic approach for employers and workers to meet defined occupational health and safety objectives and to increase awareness of health and safety in the workplace.

Notes:

- (1) Use of the singular does not exclude the plural (and vice versa) when the sense allows.
- (2) Although the intended primary application of this Standard is stated in its Scope, it is important to note that it remains the responsibility of the users of the Standard to judge its suitability for their particular purpose.
- (3) This publication was developed by consensus, which is defined by *CSA Policy governing standardization C Code of good practice for standardization* as “substantial agreement. Consensus implies much more than a simple majority, but not necessarily unanimity”. It is consistent with this definition that a member may be included in the Technical Committee list and yet not be in full agreement with all clauses of this publication.
- (4) CSA Standards are subject to periodic review, and suggestions for their improvement will be referred to the appropriate committee.
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PUBLIC REVIEW DRAFT

Z1000

Occupational Health and Safety Management

1 Scope

This Standard specifies requirements for an occupational health and safety management system ("OHSMS").

The purpose of this Standard is to enable an organization to improve its occupational health and safety (OHS) performance to prevent occupational injuries, illnesses and fatalities by:

- a) establishing, maintaining and improving an OHSMS to identify and address all OHS hazards and risks through their elimination or control;
- b) assuring itself of its conformity with its OHS policy; and
- c) demonstrating conformity with this standard by:
 - i) making a self-determination and self-declaration;
 - ii) seeking confirmation of its self-declaration by a party external to the organization; or
 - iii) seeking certification/registration of its OHSMS by an external organization.

All the requirements in this Standard are intended to be incorporated into an OHSMS. The extent of the application will depend on such factors as the nature and location of an organization's operations, and the conditions in which it functions.

This Standard is applicable to an organization of any size or type. This Standard is intended to address OHS rather than product and services safety.

2 Reference publications

None.

3 Terms and definitions

audit - systematic and documented process for obtaining audit evidence and evaluating it objectively to determine the extent to which the audit criteria are fulfilled

audit program - set of one or more audits planned for a specific time frame and directed towards a specific purpose [need to check with editors re incorporating note in definition]

NOTE - An audit program includes all activities necessary for planning, organizing and conducting the audits.

competence – demonstrated ability to apply OHS knowledge and skills

continual improvement - process of enhancing the OHSMS to achieve ongoing improvement in overall OHS performance

contractor – an organization or individual providing services to another organization in accordance with agreed upon specifications, terms and conditions

document – a medium containing information related to the OHSMS

ergonomics – integrated knowledge derived from the human and technical sciences to match jobs, systems, products and the environment to the physical and mental capabilities of people

hazard - source of potential harm to a worker

incident - an occurrence arising out of or in the course of work, which could result in an injury or illness, including near misses

legal requirements – requirements of applicable OHS federal, provincial/territorial, municipal laws, regulations and bylaws, and where applicable, provisions of the organization's collective agreements that relate to health and safety

occupational health and safety management system – a set of interrelated elements to establish and support the OHS policy, its objectives and targets and the mechanisms to achieve them those objectives and targets

organization – a company, operation, undertaking, establishment, enterprise, institution or association or part or combination thereof, whether incorporated or not, public or private, that has its own management functions

other requirements - other OHS provisions to which the organization subscribes

process - set of interrelated or interacting activities, which transforms inputs into outputs

procedure – a documented method to carry out an activity

record – a document that states results achieved or provides evidence of activities performed

risk – a combination of the likelihood of the occurrence of a hazardous event and the severity of harm caused by the event

system - set of interrelated or interacting elements

worker – a person employed by the organization or a person under the day to day control of the organization, including volunteers

worker representative – a non-managerial worker member of the workplace health and safety committee, or a worker representative as required by law or as set out in collective agreements, or selected by non-managerial workers

workplace parties – managers (including supervisors), workers and worker representatives

4 Occupational health and safety management system

4.1 General

The organization shall establish, implement and maintain a documented OHSMS in accordance with the requirements of this Standard.

The OHSMS should be integrated into or compatible with other management systems in the organization.



Figure 1 – Model of an occupational health and safety management system

4.2 Commitment, leadership and participation

Commitment, leadership and effective participation are crucial for the success of an OHSMS.

4.2.1 Management commitment and leadership

4.2.1.1 Responsibility, accountability and authority

Senior management shall provide leadership for OHS activities and assume overall responsibility for the OHSMS including:

- a) establishing, actively promoting and maintaining the OHSMS;
- b) providing appropriate financial, human and organizational resources to plan, implement, check, review and correct the OHSMS;
- c) defining roles, assigning responsibilities, establishing accountability and delegating authority to implement an effective OHSMS;

- d) establishing and implementing an OHS policy and measurable objectives;
- e) reviewing the organization's OHSMS at planned intervals;
- f) ensuring that workers and worker representatives are consulted; and
- g) providing for active participation by workers and worker representatives in the establishment and maintenance of the OHSMS.

4.2.1.2 Representative of management

The organization's senior management shall designate a specific representative(s) of management who, irrespective of other responsibilities, has defined roles, responsibilities and authority for ensuring that an OHSMS is established, maintained and reviewed in accordance with the requirements of this Standard to support;

- a) effective processes to identify and eliminate or control work-related hazards and risks;
- b) reporting on the performance of the OHSMS to senior management, workers and worker representatives for review and as the basis for improvement; and
- c) participation of members of the organization at all levels.

4.2.2 Worker participation

Worker participation is an essential aspect of the OHSMS in the organization. The organization shall encourage worker participation through such measures as identifying and removing barriers to participation.

The organization shall:

- a) provide adequate time and resources to those workers and worker representatives involved in the development of the OHS Policy and the process of planning, implementation, training, evaluation and corrective action of the OHSMS;
- b) provide mechanisms that support worker participation, including the establishment and efficient functioning of workplace health and safety committees and the recognition of worker representatives where required by OHS legislation, and where applicable, collective agreements or other requirements; and
- c) ensure that workers and worker representatives are consulted and trained on all aspects of OHS associated with their work.

4.2.3 Occupational health and safety policy

Senior management shall, in consultation with workers and worker representatives, establish and maintain the organization's OHS policy and ensure that the policy:

- a) is appropriate to the nature, scale and OHS hazards and risks associated with its activities;
- b) includes a commitment to comply with applicable OHS legal requirements and other requirements;
- c) includes a commitment to protect workers and continually improve workplace health and safety performance;
- d) provides the framework for setting and reviewing OHS objectives and targets;
- e) is documented, implemented and maintained;
- f) is posted and communicated to all workers; and
- g) is available to external interested parties, as appropriate.

4.3 Planning

This clause defines the planning requirements for an OHSMS. The purpose of planning is to identify and prioritize hazards, risks, legal requirements and other requirements, management system deficiencies and opportunities for improvement. These issues are identified with the goal of setting objectives and targets, and establishing plans to achieve compliance with legal requirements and other requirements and continual improvement.

4.3.1 Review

The organization's OHSMS, if one is in place, shall be reviewed to assess conformance with the requirements in this Standard. If no OHSMS exists, the organization shall gather and review necessary information, which shall serve as a basis for establishing an OHSMS, which conforms to this Standard.

4.3.2 Legal and other requirements

The organization shall establish and maintain a procedure to:

- a) identify and ensure access to legal requirements and other requirements, and
- b) periodically evaluate its compliance with these requirements.

The organization shall ensure that these applicable legal requirements and other requirements are incorporated in the establishment and maintenance of its OHSMS.

4.3.3 Hazard and risk identification and assessment

The organization shall establish and maintain a process to identify and assess hazards and risks on an ongoing basis. The results of this process shall be used to set objectives and targets.

4.3.4 Occupational health and safety objectives and targets

4.3.4.1

The organization shall document OHS objectives and targets for relevant functions and levels within the organization, which are measurable when practicable. The objectives and targets shall:

- a) be consistent with the OHS Policy and commitment to worker health and safety, compliance with legal requirements and other requirements, and continual improvement;
- b) be based on the review, including past performance measures and any OHS hazards, risks, management system deficiencies and opportunities for improvement identified;
- c) consider technological options and other requirements or opportunities;
- d) be reviewed and modified according to changing information and conditions as appropriate.

4.3.4.2

The organization shall establish and maintain a plan for achieving its objectives and targets. It shall include:

- a) a designation of responsibility for achieving objectives and targets at relevant functions and levels of the organization; and
- b) the means and time frame by which they are to be achieved.

4.4 Implementation

The organization shall determine, provide and maintain the infrastructure and resources needed to achieve conformity to this Standard. The organization should have access to sufficient competence to implement this Standard.

4.4.1 Preventive and protective measures

4.4.1.1

Preventive and protective measures shall be implemented in the following priority to address hazards and risks identified in clause 4.3.3:

- a) eliminate the hazard;
- b) substitute with other materials, processes or equipment;
- c) use engineering controls;
- d) use of safer work systems, such as awareness means (lights, signage, beepers, etc.);
- e) provide administrative controls, such as training and procedures; and
- f) provide personal protective equipment, including measures to ensure its appropriate use and maintenance.

4.4.1.2

The application of this hierarchy of preventive and protective measures shall take into account:

- a) the nature and extent of the hazards and risks identified;
- b) the degree of hazard and risk reduction required;
- c) applicable legal requirements;
- d) recognized standards, codes and best practices in the industry sector where applicable;
- e) the availability of suitable technology; and
- f) other requirements.

4.4.2 Emergency prevention, preparedness and response

The organization shall establish and maintain procedure(s) to prevent, prepare for and respond to emergencies including:

- a) identification of potential emergency situations where there are risks of illness or injury;
- b) plans to respond to emergency situations, and to prevent or mitigate any illness or injury;
- c) identification of the necessary resources to effectively implement the plan;
- d) periodic testing of emergency plans through drills and similar activities;
- e) periodic review and updating of procedure(s), in particular after the occurrence of emergency situations or periodic tests;
- f) communicating with workers and providing training regarding their duties and responsibilities with respect to the plans and procedures as appropriate; and
- g) communicating with contractors, visitors and relevant emergency response services, government authorities and the local community as appropriate.

4.4.3 Competence and training

4.4.3.1

The organization shall establish and maintain a procedure to:

- a) define the competence requirements for workers;
- b) ensure that workers are competent to carry out all aspects of their duties and responsibilities including standard safe operating procedures; and
- c) ensure that workers are aware of
 - i) applicable OHSMS requirements,
 - ii) their OHS rights and responsibilities under legal requirements and other requirements,
 - iii) the importance of compliance with the OHS Policy, applicable procedures and legal requirements and other requirements, and
 - iv) the potential consequences of non-compliance.

4.4.3.2

Training activities related to competence shall:

- a) be provided to all workers, based on their duties and responsibilities;
- b) be conducted by competent persons;
- c) provide effective and timely initial and refresher sessions;
- d) include participants' evaluation of the training activity;
- e) be evaluated and modified as necessary to ensure relevance and effectiveness; and
- f) be documented appropriately.

Training activities for the establishment and maintenance of the OHSMS should be provided during working hours to all participants at no cost to them.

4.4.4 Communication and awareness

The organization shall establish and maintain procedures to:

- a) communicate information about the OHSMS, the policy and the implementation plan progress to all affected levels of the organization;
- b) receive, document and respond appropriately to internal and external communications related to OHS;
- c) promptly report workplace injuries, illnesses, incidents, hazards and risks; and
- d) ensure that the concerns, ideas and inputs of workers and worker representatives on OHS matters are received, considered and responded to in a timely fashion; and
- e) utilize workplace health and safety committees or worker representatives (where they exist) as a forum for communication.

4.4.5 Procurement and contractors

4.4.5.1 Procurement

The organization shall establish a process through which purchased products, supplies and equipment, raw materials and other goods are evaluated to:

- a) identify and assess the hazards and risks associated with their use;
- b) establish requirements to eliminate or control these hazards and risks; and
- c) ensure that they conform to the organization's OHS requirements.

4.4.5.2 Contractors

The organization shall establish and maintain procedures to:

- a) evaluate and select contractors based in part on appropriate OHS criteria;
- b) identify, assess, and eliminate or control hazards and risks to the organization's workers from contractor activities and materials on the organization's premises; and

- c) identify, assess, and eliminate or control hazards and risks to contractors and their workers from the organization's activities and materials.

4.4.6 Management of change

4.4.6.1

The organization shall establish and maintain procedures to identify and assess and eliminate or control OHS hazards and risks associated with:

- a) new processes or operations at the design stage;
- b) significant changes to its work procedures, equipment, organizational structures, staffing, products, services or suppliers;
- c) developments in OHS knowledge and technology; and
- d) changes to OHS legislation, and where applicable, collective agreements or other requirements.

Such procedures should include information and training to workers as appropriate.

4.4.6.2

A hazard and risk identification and assessment should be carried out before any modification or introduction of new work methods, materials, processes, machinery or equipment in the workplace. The assessment should be performed by a competent person with appropriate participation by workers and worker representatives.

4.4.7 Documentation

The organization shall create and maintain documents and records specified by its OHSMS to implement the OHSMS effectively and to assess conformance with the requirements of this Standard. Documentation should be clearly written and easily understood.

The OHSMS documentation shall include:

- a) the organization's OHS policy and performance measures,
- b) the assignment of OHS duties and responsibilities for the implementation of the OHSMS,
- c) procedures required by this Standard;
- d) supporting documents needed by the organization to ensure the effective planning, implementation, operation and control of its OHSMS, and
- e) other documents or records required by this Standard, including those to comply with legal requirements.

4.4.7.1 Control of documents

The organization shall establish and maintain a procedure to:

- a) approve documents for adequacy prior to issue;
- b) periodically review to update, re-approve or withdraw documents as necessary;
- c) ensure that changes and the current revision status of documents are identified;
- d) ensure that relevant versions of applicable documents are available at points of use;
- e) ensure that documents remain legible and readily identifiable;
- f) ensure that documents of external origin determined by the organization to be necessary for the planning and operation of the OHSMS are identified; and

- g) prevent the unintended use of obsolete documents, and to apply suitable identification to them if they are retained for any purpose.

4.4.7.2 Control of records

The organization shall establish and maintain records to provide evidence of conformity to OHSMS requirements and of the effective operation of the OHSMS. Records shall remain legible, readily identifiable and retrievable. Procedure(s) shall be established to define the controls needed for the identification, secure storage, protection, retrieval, retention time and disposition of records. Workers should have the right to access records relevant to their OHS, while respecting the need for confidentiality.

Records may include:

- a) records arising from the implementation of the OHSMS;
- b) records of incidents involving work-related injuries and illnesses;
- c) records arising from legal requirements;
- d) records of workers' training, exposures and health, and monitoring of the working environment; and
- e) the results of monitoring; and
- f) records of changes or improvements made to eliminate or control hazards and risks.

4.5 Evaluation and corrective action

This clause defines requirements for procedures to:

- a) evaluate the performance of the OHSMS through monitoring and measurement, incident investigation, root cause analysis and audits;
- b) take corrective action when non-conformances are found in the OHSMS;
- c) follow-up and assess the effectiveness of corrective actions using both qualitative and quantitative measures; and
- d) provide feedback to the planning process and input to the management review.

4.5.1 Monitoring and measurement

4.5.1.1

The organization shall establish and maintain procedures to monitor, measure and record OHS performance and the effectiveness of the OHSMS on a regular basis. Performance monitoring and measurement shall:

- a) determine the extent to which the OHS policy, objectives and targets are being met;
- b) provide feedback on OHS performance;
- c) determine whether the day-to-day arrangements for hazard and risk identification and assessment and elimination or control are in place and operating effectively; and
- d) provide the basis for decisions about improvement in hazard and risk identification and assessment and elimination or control, and the OHSMS system.

Both qualitative and quantitative measures appropriate to the needs, size and nature of the organization shall be developed in consultation with workers and their representatives. Monitoring and measurement activities shall be recorded. When monitoring and measurement equipment used, it shall be calibrated and maintained, and records to document calibration shall be kept.

4.5.1.2

Monitoring and measurement shall include requirements of the OHSMS and results of all or some of the following depending on the nature and extent of identified hazards and risks:

- a) inspection of work systems, work organization, premises and equipment;
- b) exposure assessment;
- c) injury and illness tracking;
- d) worker rehabilitation programs; and
- e) occupational health assessment, as appropriate.

4.5.2 Incident investigation and causal analysis

The organization shall establish and maintain procedures for reporting and investigation of work-related injuries, illnesses, fatalities and OHS incidents, including near misses. These procedures shall include:

- a) the establishment of roles and responsibilities, including participation of workers and worker representatives;
- b) actions to mitigate any consequences arising from work-related injuries, illnesses, fatalities and OHS incidents;
- c) the identification of the cause(s) and the implementation of recommended corrective and preventive actions (see clause 4.5.4); and
- a) an assessment of effectiveness of any corrective and preventive actions taken.

4.5.2.1

The investigation of the origin and causes of work-related injuries, illnesses and OHS incidents shall identify any failures in the OHSMS and shall be documented. Such investigations shall be carried out by competent persons trained in injury and incident investigation, with the appropriate participation of the workplace parties.

4.5.2.2

Where appropriate, recommendations shall be developed and, along with the investigation's results, be communicated to the workplace parties for corrective action and included in the management review. The investigation results and recommendations should contribute to the continual improvement of the OHSMS.

4.5.3 Audits**4.5.3.1**

The organization shall:

- a) establish and maintain an audit program which includes designation of auditor competency, the audit scope, the frequency of audits, and audit methodology and reporting;
- b) conduct audits at planned intervals to determine whether the OHSMS:
 - i) conforms to the requirements of this Standard and to the health and safety management system requirements established by the organization, and
 - ii) is effectively implemented and maintained.

4.5.3.2

The audit results, audit conclusions and any corrective action plans shall be documented and communicated to affected workplace parties, including those responsible for corrective action along with workers and worker representatives. The organization should consult with workers and their representatives on auditor selection, the audit process, and analysis of results.

The management responsible for the activity being audited shall ensure that corrective actions are prioritized and taken to eliminate any non-conformance with the organization's OHSMS or this Standard identified during the audit.

4.5.4 Preventive and corrective action

The organization shall establish and maintain preventive and corrective action procedures to:

- a) address OHSMS nonconformances and inadequately controlled hazards;
- b) identify any newly created hazards resulting from preventive and corrective actions;
- c) expedite action on inadequately controlled hazards that could cause serious injury and illness; and
- d) track actions taken to ensure their effective implementation.

The organization shall consider input from OHSMS performance monitoring and measurement, recommendations from workers and worker representatives, OHSMS audits and management reviews in determining preventive and corrective actions.

5. Management review and continual improvement**5.1 General**

Senior management shall review the organization's OHSMS at planned intervals to ensure its continuing suitability, adequacy and effectiveness. This review shall include assessing the need for changes to the OHSMS, including the OHS policy and objectives.

5.2 Continual improvement

Management review shall include assessing opportunities for continual improvement. The organization should continually improve the effectiveness of the OHSMS.

5.3 Review input

The input to management review shall include the following OHS information:

- a) results of audits,
- b) communication received from workers and worker representatives,
- c) communication received from external interested parties,
- d) the performance of the OHSMS, including results of investigation of work-related injuries, illnesses and OHS incidents,
- e) the extent to which objectives and targets have been met,
- f) status of corrective and preventive actions,
- g) follow-up actions from previous management reviews,
- h) changing circumstances, and
- i) recommendations for improvement.

5.4 Review output

The outputs from the management review shall include any decisions and actions related to:

- a) the need for changes to the organization's OHS policy and objectives,
- b) improvements to the effectiveness of the OHSMS and its processes,
- c) the extent to which objectives and targets have been met, and
- d) allocation of resources.

Action items shall be developed from the management review. The organization shall have a process for recording and communicating the findings, conclusions and action plans of the management review to the persons responsible for action and to workers and worker representatives.

ANNEX A (Informative)

Guidance on the Use of CSA Z1000

Introduction

This supporting annex is structured in the following manner:

Normative requirements that organizations must meet to claim conformity to this Standard are included in text boxes.

Informative guidance material developed by the Technical Committee on Occupational Health and Safety Management Systems to assist users in meeting the normative requirements is found following the related requirements text.

The material provided does not constitute a normative requirement of the standard.



The check box identifies questions that an organization can use to measure its effectiveness in meeting the requirements of this Standard.

The questions provided are for guidance purposes only and do not constitute normative requirements of the standard or a formal conformity assessment process.

1 Scope

This Standard specifies requirements for an occupational health and safety management system ("OHSMS").

The purpose of this Standard is to enable an organization to improve its occupational health and safety (OHS) performance to prevent occupational injuries, illnesses and fatalities by:

- a) establishing, maintaining and improving an OHSMS to identify and address all OHS hazards and risks through their elimination or control;
- b) assuring itself of its conformity with its OHS policy; and
- c) demonstrating conformity with this standard by:
 - i) making a self-determination and self-declaration;
 - ii) seeking confirmation of its self-declaration by a party external to the organization; or
 - iii) seeking certification/registration of its OHSMS by an external organization.

All the requirements in this Standard are intended to be incorporated into an OHSMS. The extent of the application will depend on such factors as the nature and location of an organization's operations, and the conditions in which it functions.

This Standard is applicable to an organization of any size or type. This Standard is intended to address OHS rather than product and services safety.

This Standard contains basic performance requirements for an occupational health and safety management system (OHSMS) including management commitment and leadership, worker

participation, planning, implementation, evaluation and corrective action, and management review. An OHSMS provides for overall coordination of occupational health and safety (OHS) activities in an organization. The management system is designed to continually improve OHS performance and is based on the Plan-Do-Check-Review approach.

This Standard has been developed with the expectation that it can be used by an organization to conduct its own review and to make a self-declaration statement that its OHSMS conforms to the requirements of the Standard as well as by others who are external to the organization. External assessment of conformity with the Standard may be used to verify self-declaration or lead to formal certification or registration of the OHSMS.

2 Reference publications

None.

3 Terms and definitions

audit - systematic and documented process for obtaining audit evidence and evaluating it objectively to determine the extent to which the audit criteria are fulfilled

audit program - set of one or more audits planned for a specific time frame and directed towards a specific purpose [need to check with editors re incorporating note in definition

NOTE - An audit program includes all activities necessary for planning, organizing and conducting the audits.

competence – demonstrated ability to apply OHS knowledge and skills

continual improvement - process of enhancing the OHSMS to achieve ongoing improvement in overall OHS performance

contractor – an organization or individual providing services to another organization in accordance with agreed upon specifications, terms and conditions

document – a medium containing information related to the OHSMS

ergonomics – integrated knowledge derived from the human and technical sciences to match jobs, systems, products and the environment to the physical and mental capabilities of people

hazard - source of potential harm to a worker

incident - an occurrence arising out of or in the course of work, which could result in an injury or illness, including near misses

legal requirements – requirements of applicable OHS federal, provincial/territorial, municipal laws, regulations and bylaws, and where applicable, provisions of the organization's collective agreements that relate to health and safety

occupational health and safety management system – a set of interrelated elements to establish and support the OHS policy, its objectives and targets and the mechanisms to achieve them those objectives and targets

organization – a company, operation, undertaking, establishment, enterprise, institution or association or part or combination thereof, whether incorporated or not, public or private, that has its own management functions

other requirements - other OHS provisions to which the organization subscribes

process - set of interrelated or interacting activities, which transforms inputs into outputs

procedure – a documented method to carry out an activity

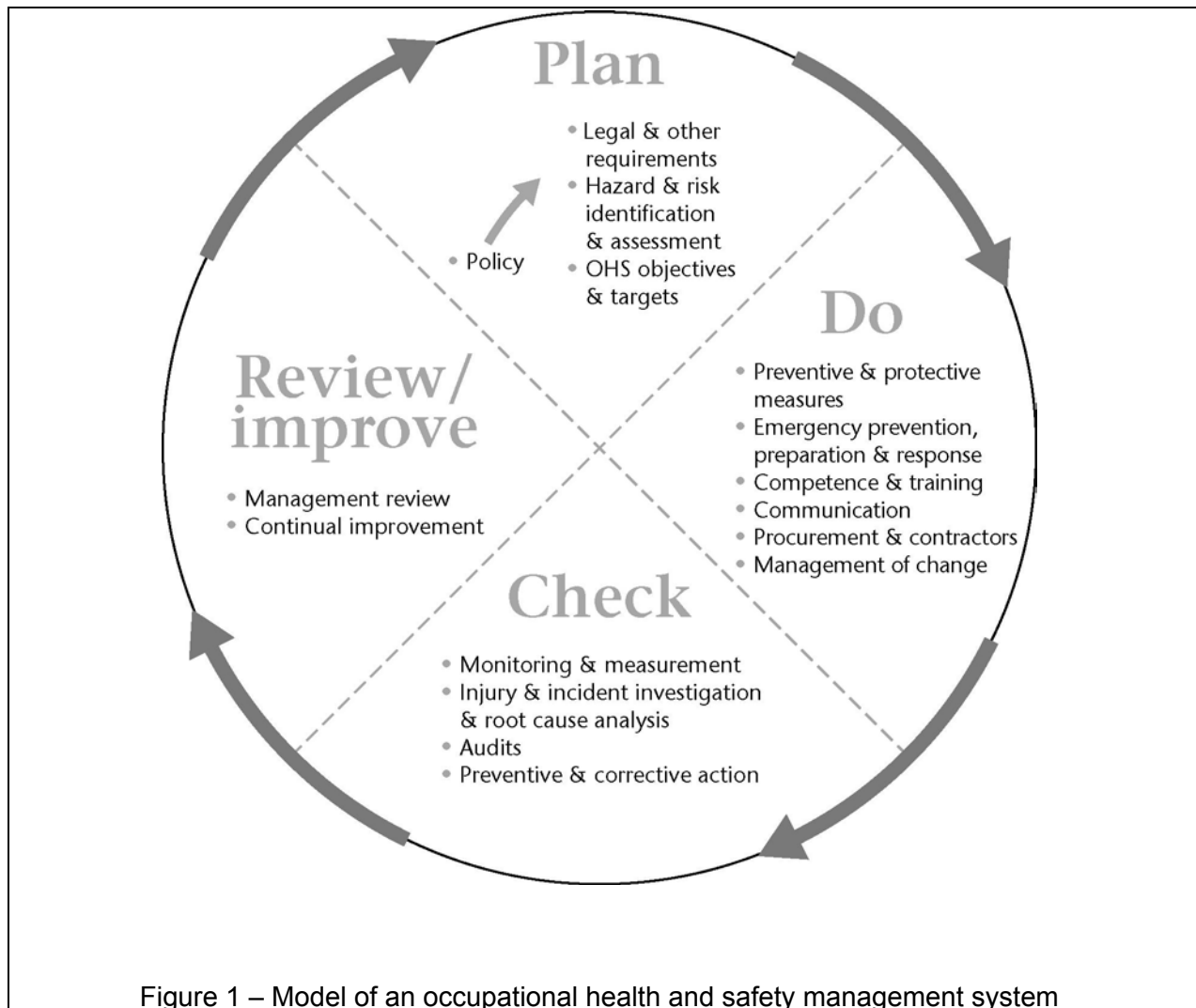
record – a document that states results achieved or provides evidence of activities performed
risk – a combination of the likelihood of the occurrence of a hazardous event and the severity of harm caused by the event
system - set of interrelated or interacting elements
worker – a person employed by the organization or a person under the day to day control of the organization, including volunteers
worker representative – a non-managerial worker member of the workplace health and safety committee, or a worker representative as required by law or as set out in collective agreements, or selected by non-managerial workers
workplace parties – managers (including supervisors), workers and worker representatives

4 Occupational health and safety management system

4.1 General

The organization shall establish, implement and maintain a documented OHSMS in accordance with the requirements of this Standard.

The OHSMS should be integrated into or compatible with other management systems in the organization.



An effective system enables an organization to manage occupational health and safety issues as an integrated part of its overall business operations. In an integrated system, the health and safety of workers is seen as a key concern for all aspects of the organization's operations including production, human resources, administration and finance, maintenance and purchasing.

Example: in the organization's purchasing process, consideration should be given to aspects related to OHS (noise, machine guarding, emissions, ergonomics) in the purchasing decision.

4.2 Commitment, leadership and participation

Commitment, leadership and effective participation are crucial for the success of an OHSMS.

4.2.1 Management commitment and leadership

4.2.1.1 Responsibility, accountability and authority

Senior management shall provide leadership for OHS activities and assume overall responsibility for the OHSMS including:

- h) establishing, actively promoting and maintaining the OHSMS;
- i) providing appropriate financial, human and organizational resources to plan, implement, check, review and correct the OHSMS;
- j) defining roles, assigning responsibilities, establishing accountability and delegating authority to implement an effective OHSMS;
- k) establishing and implementing an OHS policy and measurable objectives;
- l) reviewing the organization's OHSMS at planned intervals;
- m) ensuring that workers and worker representatives are consulted; and
- n) providing for active participation by workers and worker representatives in the establishment and maintenance of the OHSMS.

An organization's senior management plays a key role in ensuring health and safety in the workplace. Senior management should provide visible leadership to the organization's occupational health and safety initiatives and encourage worker participation. Examples of such leadership can include:

- inclusion of OHS in the organization's business planning,
- actual time spent addressing OHS, and
- visible, personal participation on OHS (on the "shop floor").

The ways in which an organization consults its workers and worker representatives on OHS matters may depend in part on the nature, size and complexity of the organization (see 4.2.2). Consultation and participation of workers may be achieved by consulting with or obtaining the participation of worker representative(s) and providing a mechanism for workers to provide input. Workers should be encouraged to provide input through their representative, where one exists.



- 1) Is senior management commitment evident in:
 - a) establishing, promoting and maintaining the organization's OHSMS?
 - b) the provision of appropriate financial, human and organizational resources for planning, implementation, checking, review and correcting the OHSMS?
 - c) defining roles, assigning responsibilities, establishing accountability and delegating authority to implement the OHSMS?
 - d) establishing and implementing an OHS policy and measurable objectives?
 - e) ensuring that workers and worker representatives are consulted?
 - f) providing for active participation by workers and worker representatives in the establishment and maintenance of the OHSMS?

4.2.1.2 Representative of management

The organization's senior management shall designate a specific representative(s) of management who, irrespective of other responsibilities, has defined roles, responsibilities and authority for ensuring that an OHSMS is established, maintained and reviewed in accordance with the requirements of this Standard to support;

- a) effective processes to identify and eliminate or control work-related hazards and risks;
- b) reporting on the performance of the OHSMS to senior management, workers and worker representatives for review and as the basis for improvement; and
- c) participation of members of the organization at all levels.

One of the key positions related to the OHSMS is that of the management representative. Within the organization, more than one person may be delegated responsibility and authority to oversee the effective working of the OHSMS. The management representative may be dedicated exclusively to OHSMS activities, or may conduct them in conjunction with other activities within the organization.

The management representative should have sufficient authority and resources to ensure that the necessary processes are established, implemented, and maintained throughout the organization, to report to senior management on the performance and needed improvement, and to ensure the participation by workers at all levels throughout the organization.



- 1) Has top management appointed someone who, irrespective of other responsibilities, has responsibility and authority that includes:
 - a) ensuring that processes needed for the OHSMS are established, maintained, and reviewed?
 - b) reporting to senior management on the performance of the OHSMS and any need for improvement?
 - c) supporting the participation of members of the organization at all levels?

4.2.2 Worker participation

Worker participation is an essential aspect of the OHSMS in the organization. The organization shall encourage worker participation through such measures as identifying and removing barriers to participation.

The organization shall:

- a) provide adequate time and resources to those workers and worker representatives involved in the development of the OHS Policy and the process of planning, implementation, training, evaluation and corrective action of the OHSMS;
- b) provide mechanisms that support worker participation, including the establishment and efficient functioning of workplace health and safety committees and the recognition of worker representatives where required by OHS legislation, and where applicable, collective agreements or other requirements; and
- c) ensure that workers and worker representatives are consulted and trained on all aspects of OHS associated with their work.

Effective worker participation is required for the successful implementation of the OHSMS.

Organizations should consult and seek the active support for its OHS policy, objectives and targets by all workers who are affected by them. Key factors that influence the effectiveness of the OHSMS include:

- a) the nature and extent of management and worker participation in the decisions affecting the OHSMS,
- b) the familiarity with and support for the system by workers at all levels of the organization, and
- c) the existence of a shared motivation to improve health and safety performance.

One important mechanism for worker participation is through a workplace health and safety committee or through a health and safety representative. Other examples of worker participation include participation in:

- relevant committees,
- OHS-specific tasks such as inspections, hazard identification and control, accident and incident investigations, audits, job hazard analyses, emergency planning and response and development of operating procedures,
- development of worker training programs,
- OHS communications,
- the introduction of new technology, equipment and materials, and
- discussions related to the use of external OHS resources.

While consultation does not mean that the organization has an obligation to obtain worker approval or permission, the organization is required to provide mechanisms that support worker participation in the OHSMS. The organization should regularly review worker participation to identify and address barriers to worker participation. These barriers can include a lack of time and resources, literacy and language barriers, failure to respond effectively to worker input or suggestions, and fear of reprisals.



- 1) Are workers and worker representatives given the time and resources to effectively participate in the OHSMS?
- 2) What mechanisms are provided to support worker participation?
- 3) Are worker and worker representatives consulted and trained on all aspects of OHS associated with their work?
- 4) If worker recommendations are not accepted, are reasons provided for not acting on or accepting them?

4.2.3 Occupational health and safety policy

Senior management shall, in consultation with workers and worker representatives, establish and maintain the organization's OHS policy and ensure that the policy:

- a) is appropriate to the nature, scale and OHS hazards and risks associated with its activities;
- b) includes a commitment to comply with applicable OHS legal requirements and other requirements;
- c) includes a commitment to protect workers and continually improve workplace health and

- safety performance;
- d) provides the framework for setting and reviewing OHS objectives and targets;
 - e) is documented, implemented and maintained;
 - f) is posted and communicated to all workers; and
 - g) is available to external interested parties, as appropriate.

The occupational health and safety policy is a formal, written statement of management's commitment to protect workers and to continually improve OHS performance. The policy gives overall direction to the actions the organization will take with respect to ensuring health and safety in the workplace. It should be appropriate in nature and scale and relevant to the organization. The policy should be reviewed on an annual basis or updated as required to ensure that it continues to be relevant to the organization's needs.

Mechanisms for communication may include: workplace postings, safety talks, organization's website, e-mails, inclusion in training programs, newsletters, etc.



1) Does the OHS policy demonstrate management's commitment to protect workers and continually improve OHS performance?

2) Is the policy periodically reviewed and updated?

4.3 Planning

This clause defines the planning requirements for an OHSMS. The purpose of planning is to identify and prioritize hazards, risks, legal requirements and other requirements, management system deficiencies and opportunities for improvement. These issues are identified with the goal of setting objectives and targets, and establishing plans to achieve compliance with legal requirements and other requirements and continual improvement.

Planning in a management system is an ongoing and recurring process. It is linked to all of the other system activities (implementation, checking and corrective action and management review and improvement). Planning involves identifying what is required to establish and maintain the OHSMS and assigning the responsibility and resources for implementing it. Each of the system activities provides feedback to the planning process and allows for continual improvement.

4.3.1 Review

The organization's OHSMS, if one is in place, shall be reviewed to assess conformance with the requirements in this Standard. If no OHSMS exists, the organization shall gather and review necessary information, which shall serve as a basis for establishing an OHSMS, which conforms to this Standard.

Many organizations have an existing OHSMS or successful OHS programs, which include some or all of the OHSMS elements required by this Standard. The review conducted during the planning process may differ depending on whether the organization has an OHSMS or is developing one to meet the Standard.



- 1) Does the review process gather and assess information concerning:
 - a) existing OHS processes and programs?
 - b) previous OHS assessments?
 - c) processes for communication and awareness?
 - d) processes for procurement and contractors?
 - e) processes for incident investigation?
 - f) processes for OHS training, instructional and educational activities?
 - g) human, financial and technical support resources assigned to OHS processes and programs?
 - h) other relevant management systems in use by the organization, and other related activities?

4.3.2 Legal and other requirements

The organization shall establish and maintain a procedure to:

- a) identify and ensure access to legal requirements and other requirements, and
- b) periodically evaluate its compliance with these requirements.

The organization shall ensure that these applicable legal requirements and other requirements are incorporated in the establishment and maintenance of its OHSMS.

The regulation of occupational health and safety in specific organizations in Canada is either a provincial, federal, or territorial responsibility depending on the nature of the organization's activities. If uncertain, the organization should contact the local OHS regulator to determine under whose jurisdiction it is regulated.

The organization should be able to track and assess the impact of changes in OHS legal and other requirements that affect its operations. The organization should consider maintaining a list of other requirements to which it subscribes.

Where they exist, collective agreements are legally binding on the organization. When considering what parts of collective agreements should be considered as relevant to OHS, it is important to consider not just those that are defined as OHS provisions. The collective agreement may include provisions relating to working alone, hours of work and overtime and the supply and use of personal protective equipment, which may have OHS implications.

Examples of legal requirements include:

- Canada Labour Code (Part II) and Regulations
- Provincial and Territorial Workplace or Occupational Health and Safety Acts and Regulations, and
- Provisions of collective agreements, which impact on the health and safety of workers in the workplace.

Examples of other requirements include:

- Memoranda of understanding and similar documents subscribed to by the organization,
- Equipment and systems standards developed by standards development organizations such as the Canadian Standards Association and Underwriters Laboratories Canada,

- Industry and trade association codes such as the Responsible Care program of the Canadian Chemical Producers Association,
- American Conference of Government Industrial Hygienists' Threshold Limit Values for Chemical Substances and Physical Agents in the Work Environment and Biological Exposure Indices, and
- Guidelines and bulletins issued by the Canadian Centre for Occupational Health and Safety, labour organizations and safety associations.

Annex A provides contact information for locating legal and other requirements.



1. Has the organization established and maintained a procedure to identify and access to applicable legal and other requirements?
2. Does the organization keep track of changes to legal and other requirements?
3. Does the organization periodically evaluate compliance with legal and other requirements?
4. Does the organization incorporate these legal and other requirements in the OHSMS as necessary?

4.3.2 Legal and other requirements

The organization shall establish and maintain a procedure to:

- c) identify and ensure access to legal requirements and other requirements, and
- d) periodically evaluate its compliance with these requirements.

The organization shall ensure that these applicable legal requirements and other requirements are incorporated in the establishment and maintenance of its OHSMS.

The regulation of occupational health and safety in specific organizations in Canada is either a provincial, federal, or territorial responsibility depending on the nature of the organization's activities. An organization should contact the local OHS regulator to determine under whose jurisdiction it is regulated.

The organization must be aware of the current and relevant legal and other requirements that affect its operations. The organization should be able to assess the impact of changes in OHS legal and other requirements. The organization should consider maintaining a list of other requirements to which it subscribes.

Where they exist, collective agreements are legally binding on the organization. When considering what parts of collective agreements should be considered as relevant to OHS, it is important to consider not just those that are defined as OHS provisions. The collective agreement may include provisions relating to working alone, hours of work and overtime and the supply and use of personal protective equipment, which may have OHS implications.

Examples of legal requirements include:

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- Provisions of collective agreements, which impact on the health and safety of workers in the workplace.

Examples of other requirements include:

- Memoranda of understanding and similar documents subscribed to by the organization,
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- American Conference of Government Industrial Hygienists' Threshold Limit Values for Chemical Substances and Physical Agents in the Work Environment and Biological Exposure Indices, and
- Guidelines and bulletins issued by the Canadian Centre for Occupational Health and Safety, labour organizations and safety associations.

Annex B provides contact information for locating legal and other requirements.



- 1) Has the organization established and maintained a procedure to identify and access to applicable legal and other requirements?
- 2) Does the organization keep track of changes to legal and other requirements?
- 3) Does the organization periodically evaluate compliance with legal and other requirements?
- 4) Does the organization incorporate these legal and other requirements in the OHSMS as necessary?

4.3.3 Hazard and risk identification and assessment

The organization shall establish and maintain a process to identify and assess hazards and risks on an ongoing basis. The results of this process shall be used to set objectives and targets.

This process includes input from workers and worker representatives. Workers who are closest to the operation may be the most familiar with it and can provide helpful information about the associated hazards and risks.

The hazard and risk identification and assessment process should consider:

- workplace inspections,
- workplace health and safety committee recommendations,
- worker or worker representative concerns or complaints,
- investigations of incidents or near-misses,
- worker illness or injury records,
- legal and other requirements,
- material safety data sheets,

- equipment manufacturer's specifications/instructions, and
- related hazard alerts or bulletins.

The process should address both the routine activities of the workplace as well as those that are non-routine or exceptional, such as the procedures to be followed in the event of an emergency. To ensure consistency, it may be appropriate to document the hazard and risk identification and assessment process and the resulting assessments.

The process should consider all OHS hazards associated with the work environment. Workplace hazards can be categorized as health hazards or safety hazards, which often overlap.

A **health hazard** is something that has the potential to cause adverse health effects. There are five major categories:

- **Chemical** agents take many forms. They can appear as gases, vapours, liquids, solids, dust, fumes or mist.
- **Biological** agents are living organisms, such as bacteria, viruses, parasites and fungi.
- **Physical** agents are forms of energy or force. They include noise, vibration, electricity, heat and cold, pressure and radiation.
- **Ergonomic** hazards result from poorly designed equipment or work processes which place undue strain on the body by repetitive or strenuous activity.
- **Psychosocial** hazards relating to production demands or the pace of work, workplace violence and harassment.

A **safety hazard** is something that has the potential to cause injury. Safety hazards include but are not limited to:

- moving parts of machinery and equipment
- handling of tools and equipment
- working at heights
- uneven or slippery ground or floor surfaces
- lifting heavy loads
- vehicle hazards
- fire and explosion hazards
- violence to staff
- flying particles
- confined space entry.

For additional information about hazard and risk identification and assessment, OHS regulators or safety associations can be contacted.

Further guidance can be found in CSA standards such as CSA Z432 *Safeguarding of machinery* and CSA Standard Z460 *Control of hazardous energy, lockout*.



- 1) Has the organization established and maintained a process to identify and assess hazards and risks on an ongoing basis, considering:
 - a) workplace inspections?

- b) workplace health and safety committee recommendations?
- c) worker or worker representative concerns or complaints?
- d) investigations of incidents or near-misses?
- e) worker illness or injury records?
- f) legal and other requirements?
- g) material safety data sheets?
- h) equipment manufacturer's specifications/instructions? And
- i) related hazard alerts or bulletins?

2) Were the results of this process used to set objectives and targets?

4.3.4 Occupational health and safety objectives and targets

4.3.4.1

The organization shall document OHS objectives and targets for relevant functions and levels within the organization, which are measurable when practicable. The objectives and targets shall:

- a) be consistent with the OHS Policy and commitment to worker health and safety, compliance with legal requirements and other requirements, and continual improvement;
- b) be based on the review, including past performance measures and any OHS hazards, risks, management system deficiencies and opportunities for improvement identified;
- c) consider technological options and other requirements or opportunities;
- d) be reviewed and modified according to changing information and conditions as appropriate.

4.3.4.2

The organization shall establish and maintain a plan for achieving its objectives and targets. It shall include:

- a) a designation of responsibility for achieving objectives and targets at relevant functions and levels of the organization; and
- b) the means and time frame by which they are to be achieved.

The initial review conducted in the planning process provides information from which measurable OHS goals and objectives for each function or aspect of the organization can be established. Through the review, the organization, in consultation with workers and worker representatives, identifies and prioritizes key areas for improvement in OHS performance, and sets objectives and targets. Prioritization should consider maximizing the opportunity for OHS improvement.



- 1) Are OHS objectives and targets consistent with the policy and based on the review noted in clause 4.3.1?
- 2) Have workers and worker representatives participated in the development of the objectives and targets?
- 3) Has a plan been developed to achieve the organization's objectives and targets,

including designation of responsibility, means and timeframe for achievement?

- 4) Are objectives and targets regularly reviewed as appropriate to reflect desired improvements in OHS performance?
- 5) Are the objectives and targets measurable?

4.4 Implementation

The organization shall determine, provide and maintain the infrastructure and resources needed to achieve conformity to this Standard. The organization should have access to sufficient competence to implement this Standard.

Examples of resources are people, equipment, and space.

The competence required to complete the implementation can be acquired through:

- training of existing staff,
- hiring of health and safety professionals, and
- external health and safety resources.

Annex B provides information for external resources that may be helpful in implementing the Standard.



- 1) Have adequate resources been assigned to achieve conformity with the Standard?
- 2) Does the organization possess, or have access to sufficient competence to implement the Standard?

4.4.1 Preventive and protective measures

4.4.1.1

Preventive and protective measures shall be implemented in the following priority to address hazards and risks identified in clause 4.3.3:

- a) eliminate the hazard;
- b) substitute with other materials, processes or equipment;
- c) use engineering controls;
- d) use of safer work systems, such as awareness means (lights, signage, beepers, etc.);
- e) provide administrative controls, such as training and procedures; and
- f) provide personal protective equipment, including measures to ensure its appropriate use and maintenance.

4.4.1.2

The application of this hierarchy of preventive and protective measures shall take into account:

- a) the nature and extent of the hazards and risks identified;
- b) the degree of hazard and risk reduction required;
- c) applicable legal requirements;
- d) recognized standards, codes and best practices in the industry sector where applicable;
- e) the availability of suitable technology; and
- f) other requirements.

Examples of the hierarchy of preventive and protective measures in 4.4.1.1 include:

- a) the elimination of the hazard through workplace design specifications, work design standards and new or revised procedures and work practices,
- b) the substitution of processes, or the use of different types or grades of material or equipment,
- c) the use of engineering controls such as ventilation systems, machine guarding or noise abatement,
- d) the use of safer work systems, new or modified technology including software, systems for hazard warning or raising awareness (lights to attract attention, audible alarms, signage),
- e) the use of administrative controls such as safe work procedures, worker training, work scheduling and assignment, and implementation of access restrictions to work areas by means of signage or barricades, and
- f) the provision of personal protective equipment and measures to ensure its correct use and maintenance.

This process of selecting preventive and protective measures continues down the hierarchy until the highest-level feasible measure is identified. A combination of measures may be required to ensure the protection of workers.

The Standard also references taking into account “best practices”. These could include cost-effectiveness, the organization’s internal standards, rules and procedures and consideration of the special needs of workers, including those of workers with disabilities.



- 1) Does the organization apply the hierarchy of preventive and protective measures?

4.4.2 Emergency prevention, preparedness and response

The organization shall establish and maintain procedure(s) to prevent, prepare for and respond to emergencies including:

- a) identification of potential emergency situations where there are risks of illness or injury;
- b) plans to respond to emergency situations, and to prevent or mitigate any illness or injury;
- c) identification of the necessary resources to effectively implement the plan;
- d) periodic testing of emergency plans through drills and similar activities;
- e) periodic review and updating of procedure(s), in particular after the occurrence of emergency situations or periodic tests;
- f) communicating with workers and providing training regarding their duties and responsibilities with respect to the plans and procedures as appropriate; and
- g) communicating with contractors, visitors and relevant emergency response services, government authorities and the local community as appropriate.

The organization's ability to respond quickly and effectively in the event of an emergency situation begins with an identification of the potential for, and the required response to, foreseeable emergencies, both natural and human caused including the prevention or mitigation of any illness or injury.

Emergency procedures must comply with applicable legal requirements, including fire codes and emergency response acts. Further information on emergency response can be found in CSA Standard Z731 *Emergency Preparedness and Response*.



- 1) Has the organization established and maintained emergency prevention, preparedness and response procedures to:
 - a) identify potential emergency situations?
 - b) define the responses to emergency situations?
 - c) identify the necessary resources?
 - d) require periodic testing of emergency plans?
 - e) specify review and update procedures?
 - f) communicate with workers and provide training? and
 - g) communicate with contractors, visitors and relevant emergency response services?

4.4.3 Competence and training

4.4.3.1

The organization shall establish and maintain a procedure to:

- a) define the competence requirements for workers;
- b) ensure that workers are competent to carry out all aspects of their duties and responsibilities including standard safe operating procedures; and
- c) ensure that workers are aware of
 - i) applicable OHSMS requirements,
 - ii) their OHS rights and responsibilities under legal requirements and other requirements,
 - iii) the importance of compliance with the OHS Policy, applicable procedures and legal requirements and other requirements, and
 - iv) the potential consequences of non-compliance.

4.4.3.2

Training activities related to competence shall:

- a) be provided to all workers, based on their duties and responsibilities;
- b) be conducted by competent persons;
- c) provide effective and timely initial and refresher sessions;
- d) include participants' evaluation of the training activity;
- e) be evaluated and modified as necessary to ensure relevance and effectiveness; and
- f) be documented appropriately.

Training activities for the establishment and maintenance of the OHSMS should be provided during working hours to all participants at no cost to them.

This clause deals with the requirement for an organization to demonstrate that those who perform tasks, which may impact on occupational health and safety in the workplace are competent as a result of appropriate education, training and experience. OHS-related training or instruction should be conducted at all levels of the organization, including senior management. The training should reference the elements of the OHSMS and specific OHS duties and responsibilities.

Competency can be verified by appropriate evaluation or as required by legal or other requirements. Competence requirements for workers can be identified by considering:

- a) job or task descriptions and duties, including reporting hazards,
- b) supervisor and worker input,
- c) accident, illness and injury data,
- d) equipment manufacturer's specifications, and
- e) legal and other requirements.

Regular duties and responsibilities can include voluntary or additional responsibilities assumed on behalf of the organization. An example of an additional responsibility is emergency response (fire response, spill clean up, first aid).

Workers should be informed of the consequences of non-compliance with policies and procedures. The potential consequences of non-compliance include:

- a) illness and injury,
- b) work disruptions,
- c) product losses,
- d) internal disciplinary action, and
- e) prosecutions and fines under legal requirements.

Worker's rights include:

- a) right to know the hazards associated with the work and how to avoid them,
- b) right to participate in keeping the workplace safe,
- c) right to refuse unsafe work, and
- d) right to protection from reprisals for exercising these rights.

Worker's responsibilities include:

- a) reporting hazardous conditions,
- b) following workplace OHS policies and procedures,
- c) wearing protective equipment provided by the organization, and
- d) complying with OHS legal requirements.

In developing and providing training activities as required by clause 4.4.3.2, the organization should consider:

- new hire and temporary worker orientation,
- on-going and refresher training for workers,
- training needs of workers who change jobs within the organization,
- specific needs or requirements including those related to learning ability, language functionality and literacy,
- the in-house or external training resources required, and

- how to evaluate the effectiveness of the training.



- 1) Has the organization established and maintained a procedure to:
 - a) define the competence requirements for workers?
 - b) ensure that workers are competent to carry out all OHS aspects of their duties and responsibilities?
 - c) ensure that workers are aware of applicable OHSMS requirements and their OHS rights and responsibilities?
 - d) communicate the importance of compliance with the OHS Policy, applicable procedures and legal and other requirements?
 - e) the potential consequences of non-compliance?

- 2) Are training activities related to competence:
 - a) provided to all workers, based on their duties and responsibilities?
 - b) conducted by competent persons?
 - c) delivered on an effective and timely basis?
 - d) evaluated by participants in the training activity?
 - e) modified as necessary to ensure relevance and
 - f) effectiveness? and
 - g) documented appropriately?

4.4.4 Communication and awareness

The organization shall establish and maintain procedures to:

- a) communicate information about the OHSMS, the policy and the implementation plan progress to all affected levels of the organization;
- b) receive, document and respond appropriately to internal and external communications related to OHS;
- c) promptly report workplace injuries, illnesses, incidents, hazards and risks;
- d) ensure that the concerns, ideas and inputs of workers and worker representatives on OHS matters are received, considered and responded to in a timely fashion; and
- e) utilize workplace health and safety committees or worker representatives (where they exist) as a forum for communication.

The organization should consider communication mechanisms such as:

- a) briefings to workers, worker representatives, and management on OHS performance,
 - b) notice boards, and
 - c) posters and newsletters
- to encourage active worker participation.



- 1) Has the organization established and maintained procedures to:
 - a) communicate information about the OHSMS?
 - b) communicate information about the policy and the implementation plan progress?
 - c) receive, document and respond to internal and external OHS communications?
 - d) report workplace injuries, illnesses, incidents, hazards and risks?
 - e) receive, consider and respond to the OHS concerns, ideas and inputs of

- workers and worker representatives in a timely fashion?
- f) utilize workplace health and safety committees or worker representatives as a forum for communication?

4.4.5 Procurement and contractors

4.4.5.1 Procurement

The organization shall establish a process through which purchased products, supplies and equipment, raw materials and other goods are evaluated to:

- a) identify and assess the hazards and risks associated with their use;
- b) establish requirements to eliminate or control these hazards and risks; and
- c) ensure that they conform to the organization's OHS requirements.

This process helps to ensure that hazards and risks are addressed in the design or purchasing phases instead of requiring retrofit or control measures after the item arrives. This process can also aid in the planning of training.

In establishing a procurement process, the organization should consider:

- a) documentation on safe use and handling of machinery and equipment, such as manufacturer's safe use instructions,
- b) WHMIS supplier labels and material safety data sheets,
- c) manufacturer's technical specifications, such as noise levels, voltage or guards,
- d) the organization's OHS requirements,
- e) ergonomic and human factors,
- f) training associated with the use of purchased products, supplies and equipment,
- g) the post-use OHS handling and disposal of purchased products, supplies and equipment, and
- h) any requirements in law, codes or industry standards.



- 1) Has the organization established a process to evaluate products, supplies and equipment, raw materials and other goods to:
 - a) identify and assess the associated hazards and risks?
 - b) establish how to eliminate or control these hazards and risks?
 - c) ensure that they conform to OHS requirements?

4.4.5.2 Contractors

The organization shall establish and maintain procedures to:

- a) evaluate and select contractors based in part on appropriate OHS criteria;
- b) identify, assess, and eliminate or control hazards and risks to the organization's workers from contractor activities and materials on the organization's premises; and
- c) identify, assess, and eliminate or control hazards and risks to contractors and their workers from the organization's activities and materials.

Procedures for contractors working on site should include:

- a) OHS criteria in the evaluation and selection of contractors to ensure that they are competent, licensed, qualified and experienced as required;

- b) effective ongoing communication and coordination between appropriate levels of the organization and the contractor, including communication of hazards and risks and measures to be taken to prevent and control them;
- c) reporting of work-related injuries, illness and incidents among the contractor's workers while performing work for the organization;
- d) verification that relevant workplace health and safety hazard awareness and training has been provided to contract workers prior to commencing work and as work progresses, as necessary;
- e) verification of supervision of contractor's workers on site;
- f) verification that contractor's workers follow appropriate OHS procedures; and
- g) where there are multiple contractors at the workplace, implementation of a process for coordinating the organization's OHSMS with that of the contractors.

The Standard does not make the organization responsible or liable for the supervision of the contractor's workers, or for the matters under the contractor's control.



- 1) Has the organization established and maintained procedures to:
 - a) evaluate and select contractors?
 - b) identify, assess, and eliminate or control hazards and risks to the organization's workers from contractor activities and materials on the organization's premises? and
 - c) identify, assess, and eliminate or control hazards and risks to contractors and their workers from the organization's activities and materials?

4.4.6 Management of change

4.4.6.1

The organization shall establish and maintain procedures to identify and assess and eliminate or control OHS hazards and risks associated with:

- a) new processes or operations at the design stage;
- b) significant changes to its work procedures, equipment, organizational structures, staffing, products, services or suppliers;
- c) developments in OHS knowledge and technology; and
- d) changes to OHS legislation, and where applicable, collective agreements or other requirements.

Such procedures should include information and training to workers as appropriate.

4.4.6.2

A hazard and risk identification and assessment should be carried out before any modification or introduction of new work methods, materials, processes, machinery or equipment in the workplace. The assessment should be performed by a competent person with appropriate participation by workers and worker representatives.

Change is best managed when the organization anticipates potential impacts, and when workers and worker representatives are consulted. Internal changes which may create new hazards and risks include significant changes to:

- facilities, processes or operations
- work procedures or methods,
- machinery, equipment or tools,
- organizational structure or staffing levels,
- the organization's products, and
- services, materials or suppliers.

External changes include:

- new or amended legal and other requirements, and
- new OHS knowledge or technologies.

The change management procedure should address factors noted in the guidance to clause 4.4.5.1 *Procurement* in the design of machines, equipment and facilities as most hazards and risks are best addressed at the design stage.



- 1) Has the organization established and maintained procedures to identify:
 - a) hazards and risks associated with new processes or operations at the design stage?
 - b) significant changes to its work procedures, equipment, organizational structures, staffing, products, services or suppliers?
 - c) developments in OHS knowledge and technology? and
 - d) changes to OHS legislation, collective agreements or other requirements?
- 2) Are hazard and risk identification and assessments carried out before any modification or introduction of new work methods, materials, processes, machinery or equipment in the workplace?
- 3) Are assessments performed by a competent person?
- 4) Is there appropriate participation by workers and worker representatives?

4.4.7 Documentation

The organization shall create and maintain documents and records specified by its OHSMS to implement the OHSMS effectively and to assess conformance with the requirements of this Standard. Documentation should be clearly written and easily understood.

The OHSMS documentation shall include:

- a) the organization's OHS policy and performance measures,
- b) the assignment of OHS duties and responsibilities for the implementation of the OHSMS,
- c) procedures required by this Standard;
- d) supporting documents needed by the organization to ensure the effective planning, implementation, operation and control of its OHSMS, and
- e) other documents or records required by this Standard, including those to comply with legal requirements.

Documentation is essential to the implementation of an OHSMS, the assessment of its effectiveness, and the degree of conformance with the requirements of this Standard. The
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extent of the OHSMS documentation can differ from one organization to another due to the size of the organization and type of activities, and the complexity of processes and their interactions.

Large organizations commonly rely on extensive and formal documentation to track and control their processes and procedures while smaller ones may use less formal mechanisms to achieve these objectives. The documentation can be in any form or type of medium provided that the requirements of clause 4.4.7.1 and 4.4.7.2 are met.

The Standard requires documentation in the following areas (clause references are in brackets):

- a) the OHS policy (4.2.3) and performance measures,
- b) the assignment of OHS duties and responsibilities for the implementation of the OHSMS (4.2.1.1 c),
- c) legal and other requirements (4.3.2),
- d) the OHS objectives and targets (4.3.4.1),
- e) preventive and protective measures – administrative controls (4.4.1.1. e)
- f) emergency preparedness and response (4.4.2)
- g) the OHS training activities related to competence (4.4.3.1 and 4.4.3.2),
- h) internal and external communications related to OHS (4.4.4),
- i) use of contractors (4.4.5.2)
- j) management of change (4.4.6.1)
- k) control of documents (4.4.7.1) and records (4.4.7.2)
- l) monitoring and measurement activities (4.5.1.1),
- m) incident investigation and causal analysis (4.5.2), and
- n) OHSMS audits results, conclusions and corrective action plans (4.5.3.2, 4.5.4).

Supporting documentation may include:

- a) copies of legislation, and
- b) standards and codes applicable to the organization.



- 1) Has the organization created and maintained the documents and records:
 - a) specified by its OHSMS?
 - b) required to implement the OHSMS effectively?
 - c) required to assess conformance with the requirements of this Standard?
- 2) Is the documentation clearly written and easily understood?
- 3) Does the OHSMS documentation include:
 - a) the organization's OHS policy and performance measures?
 - b) the assignment of duties and responsibilities for the implementation of the OHSMS?
 - c) the procedures required by this Standard?
 - d) supporting documents which ensure the effective planning, implementation, operation and control of its OHSMS?
 - e) other documents or records required by the Standard, including those to comply with legal requirements?

4.4.7.1 Control of documents

The organization shall establish and maintain a procedure to:

- a) approve documents for adequacy prior to issue;
- b) periodically review to update, re-approve or withdraw documents as necessary;
- c) ensure that changes and the current revision status of documents are identified;
- d) ensure that relevant versions of applicable documents are available at points of use;
- e) ensure that documents remain legible and readily identifiable;
- f) ensure that documents of external origin determined by the organization to be necessary for the planning and operation of the OHSMS are identified; and
- g) prevent the unintended use of obsolete documents, and to apply suitable identification to them if they are retained for any purpose.

Procedures are necessary to ensure that documentation can be located and retrieved as required. In establishing these procedures, the following elements could be considered:

- a master list of documents
- a designated person(s) to control the issue of documentation
- an identified expiry date where appropriate
- appropriate personnel are informed of the location where the documentation is kept and able to access it, and
- document format and content for ease of use.

Where applicable, controlled documents should include the following information: title, reference number, date issued and date effective, revision level, review date or review frequency, revision history, author, approved by, distribution list, pagination, and computer file references.

Documentation could be made available on a central computer system, or by maintaining a master list of documents or data that records their level of approval, distribution (location of copies), and revision status.

When retained, obsolete or superseded controlled documents should be clearly marked or kept in a secure location, and other copies should be disposed of. It may be possible to maintain detailed records of changes as they are made, rather than retaining actual copies of each issue of every document. Where document control is achieved by electronic means, special attention should be given to methods for identifying appropriate approval of electronic copies, access, security, distribution, media, backup, and archiving procedures.



- 1) Are the documents required by the OHSMS controlled (see clause 4.4.7.1)?
- 2) Has the organization established a documented procedure for the control of documents?
- 3) Does this documented procedure define the controls needed to:
 - a) approve documents for adequacy prior to use?
 - b) review, update as necessary, and re-approve documents?
 - c) ensure that changes and the current revision of the document are identified?
 - d) ensure that relevant versions of applicable documents are available at points of use?
 - e) ensure that documents remain legible and readily identifiable?

- f) ensure that documents of an external origin are identified, and their distribution controlled?
- g) prevent the unintended use of obsolete documents, and apply suitable identification to them if they are retained for any purpose?

4.4.7.2 Control of records

The organization shall establish and maintain records to provide evidence of conformity to OHSMS requirements and of the effective operation of the OHSMS. Records shall remain legible, readily identifiable and retrievable. Procedure(s) shall be established to define the controls needed for the identification, secure storage, protection, retrieval, retention time and disposition of records. Workers should have the right to access records relevant to their OHS, while respecting the need for confidentiality.

Records may include:

- a) records arising from the implementation of the OHSMS;
- b) records of incidents involving work-related injuries and illnesses;
- c) records arising from legal requirements;
- d) records of workers' training, exposures and health, and monitoring of the working environment;
- e) the results of monitoring; and
- f) records of changes or improvements made to eliminate or control hazards and risks.

Records should be prepared, stored safely, protected from unauthorized access, protected from alteration, and maintained by the organization. Records should be properly identified, collected, indexed, and filed, and be readily accessible as and where needed. They may be stored or copied in any suitable form, for example, hard copy, microfilm, or electronic media. Where records are held on electronic media, consideration of the retention times and accessibility of the records should take into account the rate of degradation of the electronic images and the availability of the devices and software needed to access the records. Such copies of records should contain all the relevant information in the original records.

Special attention should be paid to the archival of records, which need to be held in accordance with legal or other time-specified requirements. Personal privacy laws should also be considered in the collection, use, sharing and disposition of information.



- 1) Has the organization established a documented procedure to define the control of OHS records?
- 2) Are OHS records legible, readily identifiable and retrievable?
- 3) Does the documented procedure define the controls needed for the identification, storage, protection, retrieval, retention time and disposition of records?

4.5 Evaluation and corrective action

This clause defines requirements for procedures to:

- a) evaluate the performance of the OHSMS through monitoring and measurement, incident investigation, root cause analysis and audits;
- b) take corrective action when non-conformances are found in the OHSMS;
- c) follow-up and assess the effectiveness of corrective actions using both qualitative and quantitative measures; and
- d) provide feedback to the planning process and input to the management review.

4.5.1 Monitoring and measurement**4.5.1.1**

The organization shall establish and maintain procedures to monitor, measure and record OHS performance and the effectiveness of the OHSMS on a regular basis. Performance monitoring and measurement shall:

- a) determine the extent to which the OHS policy, objectives and targets are being met;
- b) provide feedback on OHS performance;
- c) determine whether the day-to-day arrangements for hazard and risk identification and assessment and elimination or control are in place and operating effectively; and
- d) provide the basis for decisions about improvement in hazard and risk identification and assessment and elimination or control, and the OHSMS system.

Both qualitative and quantitative measures appropriate to the needs, size and nature of the organization shall be developed in consultation with workers and their representatives. Monitoring and measurement activities shall be recorded. When monitoring and measurement equipment used, it shall be calibrated and maintained, and records to document calibration shall be kept.

4.5.1.2

Monitoring and measurement shall include requirements of the OHSMS and results of all or some of the following depending on the nature and extent of identified hazards and risks:

- a) inspection of work systems, work organization, premises and equipment;
- b) exposure assessment;
- c) injury and illness tracking;
- d) worker rehabilitation programs; and
- e) occupational health assessment, as appropriate.

The results of measurement and monitoring activities are used to determine whether the system is functioning as intended and is in compliance with the requirements of this Standard.

While work-related injury and illness rates are commonly used to measure the effectiveness of an OHSMS, these are not to be the only, or even the primary means to evaluate the performance the OHSMS. As these numbers measure the same injuries, illnesses and losses that the OHSMS is established to prevent, there may be a tendency for organizations to attempt to concentrate on just improving injury and illness rates rather than directing its efforts to improving its methods of hazard identification, risk assessment and control or other weaknesses in the OHSMS.

Monitoring and measurement activities should be both proactive and reactive. Proactive monitoring provides for the measurement of the required elements of the OHSMS. Examples of proactive monitoring include:

- a) implementation of corrective action plans,
- b) tracking of OHS objectives and targets,
- c) assessment of training,
- d) systematic inspection of facilities, work processes (such as job hazard analysis) and equipment,
- e) the work environment including the organization of work and the work activities,
- f) worker health, and
- g) compliance with OHS legal and other requirements.

Examples of reactive monitoring include:

- a) trend analysis in work related injuries and incidents,
- b) frequency and severity of injuries and incidents,
- c) worker rehabilitation and health restoration programs,
- d) losses associated with damage to property and equipment, and
- e) content and quality of related records.



- 1) Has the organization established and maintained procedures to monitor, measure and record OHS performance and the effectiveness of the OHSMS on a regular basis?
- 2) Does performance monitoring and measurement:
 - d) determine the extent to which the OHS policy, objectives and targets are being met?
 - e) provide feedback on OHS performance?
 - f) determine whether the day-to-day arrangements for hazard and risk identification and assessment and elimination or control are in place and operating effectively?
 - g) provide the basis for decisions for improvement of the OHSMS
- 3) Have both qualitative and quantitative measures appropriate to the needs, size and nature of the organization developed?
- 4) Have monitoring and measurement activities been recorded?
- 5) When monitoring and measurement equipment is used, is it calibrated and maintained, and are calibration records available?
- 6) Does monitoring and measurement include:
 - a) inspection of work systems, work organization, premises and equipment;
 - b) exposure assessment;
 - c) injury and illness tracking;
 - d) worker rehabilitation programs; and
 - e) occupational health assessment, as appropriate?

4.5.2 Incident investigation and causal analysis

The organization shall establish and maintain procedures for reporting and investigation of work-related injuries, illnesses, fatalities and OHS incidents, including near misses. These procedures shall include:

- a) the establishment of roles and responsibilities, including participation of workers and worker representatives;
- b) actions to mitigate any consequences arising from work-related injuries, illnesses, fatalities and OHS incidents;
- c) the identification of the cause(s) and the implementation of recommended corrective and preventive actions (see clause 4.5.4); and
- d) an assessment of effectiveness of any corrective and preventive actions taken.

4.5.2.1

The investigation of the origin and causes of work-related injuries, illnesses and OHS incidents shall identify any failures in the OHSMS and shall be documented. Such investigations shall be carried out by competent persons trained in injury and incident investigation, with the appropriate participation of the workplace parties.

4.5.2.2

Where appropriate, recommendations shall be developed and, along with the investigation's results, be communicated to the workplace parties for corrective action and included in the management review. The investigation results and recommendations should contribute to the continual improvement of the OHSMS.

The procedures should define and provide for communication of the authority, roles and responsibilities of the workplace parties. Persons with a role or responsibility should receive appropriate training or instruction regarding their role and responsibility.

The procedures should identify:

- a) specific events to be reported and investigated,
- b) who conducts the investigations,
- c) required documents and records,
- d) follow up on corrective action for completion and effectiveness, and
- e) legal and other requirements for investigations and reporting.

It is essential to involve those persons who have knowledge of the organization's work processes and equipment such as supervisors, workers and their representatives. Senior management should be involved in all major or serious injuries and incidents as their presence demonstrates the importance of the investigation and helps ensure that corrective actions are taken to prevent future recurrences.

Investigators should be knowledgeable in injury and incident investigation techniques including how to gather critical information, conduct causal analysis, plan corrective action, write reports and follow up. The competency of investigators should be regularly reviewed to identify ongoing training needs.

An investigation form should be used to promote a consistent and logical approach to identify the causes including:

- a) immediate cause(s) - what caused the incident,
- b) underlying cause(s) - why the immediate cause existed,
- c) fundamental or root cause(s), such as any OHSMS non-conformance.

Management system nonconformances may arise where:

- a) a process or procedure required by the Standard is not in place,
- b) a process or procedure is inadequate (e.g. not communicated or understood), or
- c) there is non-compliance with or non-enforcement of an existing process or procedure.

Follow up verifies the completion and effectiveness of corrective actions. Accountability and time frames for completion should be identified for each corrective action.

Where investigate on reports prepared by external organizations (health clinics, regulators, police, coroner, insurance providers) have been brought to the attention of the organization, they should be considered if they are relevant to the investigation, taking into account issues of confidentiality.

More information on accident investigation processes and tools can be found in CSA Standard CAN/CSA Z796 *Accident Information*.



- 1) Does the organization have procedures for reporting of work-related injuries, illnesses, fatalities and OHS incidents? Do these procedures include:
 - a) Defined roles and responsibilities?
 - b) Actions to mitigate consequences of these events?
 - c) Implementation and assessment of corrective and preventive actions as appropriate?
- 2) Are accident and incident investigations performed by competent person(s) as soon as possible after the event occurs so that complete and accurate information is obtained?
- 3) Are the outcomes of investigations documented and communicated to the workplace health and safety committee(s) and to those who are responsible for implementing corrective action recommendations?
- 4) Are the outcomes of investigations communicated to external governmental OHS agencies as required?
- 5) Are accident and incident investigation reports completed by external agencies referred for review and action within the organization?

4.5.3 Audits

4.5.3.1

The organization shall:

- a) establish and maintain an audit program which includes designation of auditor competency, the audit scope, the frequency of audits, and audit methodology and reporting;
- b) conduct audits at planned intervals to determine whether the OHSMS:
 - i) conforms to the requirements of this Standard and to the health and safety management system requirements established by the organization, and
 - ii) is effectively implemented and maintained.

4.5.3.2

The audit results, audit conclusions and any corrective action plans shall be documented and communicated to affected workplace parties, including those responsible for corrective action along with workers and worker representatives. The organization should consult with workers and their representatives on auditor selection, the audit process, and analysis of results.

The management responsible for the activity being audited shall ensure that corrective actions are prioritized and taken to eliminate any non-conformance with the organization's OHSMS or this Standard identified during the audit.

Audits required by this clause are to determine conformance with the requirements of this standard and whether the OHSMS is effectively implemented and maintained by the organization. This includes assessment of whether the organization has implemented a policy, set objectives and targets, and whether the OHSMS has promoted the participation of workers and worker representatives. While the audit may not determine compliance with legal requirements, it should identify whether compliance audits are conducted.

The organization should consult with workers and worker representatives on auditor selection, the audit process, and on analysis of the results, as appropriate.

The organization should determine who will conduct the audit:

- a) persons associated with the activity being audited
- b) persons internal to the organization who are independent of the activity being audited, or
- a) independent third parties external to the organization.

Audits should be planned and scheduled to encompass the elements of the OHSMS that are covered by this Standard. The requirements of this Standard include the following elements:

- 4.2.1. Management commitment and leadership
- 4.2.2. Worker participation
- 4.2.3. Occupational health and safety policy
- 4.3.1. Review
- 4.3.2. Legal and other requirements
- 4.3.3. Hazard and risk identification and assessment
- 4.3.4. Occupational health and safety objectives and targets
- 4.4. Implementation
- 4.4.1. Preventive and protective measures

- 4.4.2 Emergency prevention, preparedness and response
- 4.4.3 Competence and training
- 4.4.4 Communication and awareness
- 4.4.5 Procurement and contractors
- 4.4.6 Management of change
- 4.4.7 Documentation
- 4.5.1. Monitoring and measurement
- 4.5.2. Injury and incident investigation and root cause analysis
- 4.5.3. Audits
- 4.5.4. Preventive and corrective action
- 5.1. Management review and continual improvement – General
- 5.2. Continual improvement
- 5.3. Review input
- 5.4. Review output

In general, all elements in the organization's OHSMS should be audited annually. A complete audit can be conducted or parts of the system can be audited individually.

In addition to the regularly scheduled audits, an audit may be triggered for the following reasons:

- a) significant changes have been made, either in the organization or in the processes;
- b) an analysis of nonconformities points to a potential problem area in the organization;
- c) high employee turnover in a department, where health and safety may be jeopardized due to nonconformities; and
- d) verification that corrective or preventive action has been taken and is effective.

More information on management systems auditing can be found in CSA Standard CAN/CSA-ISO 19011.



- 1) Has the organization established an audit program to support the organization's audit policy?
- 2) Has the organization conducted audits of the OHSMS at planned intervals?
- 3) Has it been determined that the organization's OHSMS:
 - e) meets the requirements of CSA Z1000?
 - f) has been properly implemented and maintained?
- 4) Are the audit results, conclusions and corrective action recommendations documented and communicated to those responsible for corrective action?
- 5) Are workers and worker representatives consulted in the audit process?
- 6) Has management ensured that corrective actions are taken to eliminate any non-conformance with the OHSMS or this Standard identified during the audit?

4.5.4 Preventive and corrective action

The organization shall establish and maintain preventive and corrective action procedures to:

- a) address OHSMS nonconformances and inadequately controlled hazards;
- b) identify any newly created hazards resulting from preventive and corrective actions;
- c) expedite action on inadequately controlled hazards that could cause serious injury and illness; and
- d) track actions taken to ensure their effective implementation.

The organization shall consider input from OHSMS performance monitoring and measurement, recommendations from workers and worker representatives, OHSMS audits and management reviews in determining preventive and corrective actions.

Preventive actions are those taken to eliminate the cause of a potential OHSMS nonconformance or other undesirable potential situation. Corrective actions are those taken to eliminate the cause of a detected OHSMS nonconformance or other undesirable situation.

The corrective action taken to address non-conformance with the requirements of the OHSMS provides input to the management review described in clause 5 *Management review and continual improvement*, and in this way feeds back into the planning process. Feedback to the planning process is expected to produce action to address nonconformances and deviations through preventive and corrective actions.

In order to improve the effectiveness of the OHSMS, the organization should address all identified nonconformances through the appropriate preventive and corrective action process regardless of how they were identified. Other sources for determining preventive and corrective actions may include:

- a) incident investigations
- b) workplace inspections
- c) change management processes,
- d) system audits,
- e) workplace health and safety committee recommendations,
- f) worker and worker representative suggestions or concerns, and
- g) external sources such as research institutions, industry standards, government agencies.

The procedures should address accountability for completion of action plan items, time frames for completion, and assessment of their effectiveness. Where the recommended preventive and corrective action requires time to implement, interim action should be taken.



- 1) Has the organization established and maintained preventive and corrective action procedures to:
 - a) address hazards and risks that have not been adequately controlled by the requirements of clause 4.4.1; and
 - b) identify any newly created hazards and evaluate the overall risk reduction (see clause 4.4.6)?

- 2) Has the organization considered input from OHSMS performance monitoring and measurement, OHSMS audits and management reviews in determining

corrective and preventive actions?

5. Management review and continual improvement

5.1 General

Senior management shall review the organization's OHSMS at planned intervals to ensure its continuing suitability, adequacy and effectiveness. This review shall include assessing the need for changes to the OHSMS, including the OHS policy and objectives.

The management review process is expected to identify the need for change to the OHSMS and the actions that are required to address changes, remedy deficiencies and ensure continual improvement.

Management reviews should:

- a) evaluate the ability of the OHSMS to meet the overall needs of the organization and its stakeholders, including workers and regulatory authorities;
- b) evaluate the effectiveness of the OHSMS in reducing work-related injuries and illness;
- c) identify what actions are necessary to remedy any deficiencies in a timely manner;
- d) provide feedback, including the determination of OHSMS priorities;
- e) evaluate the effectiveness of follow-up actions from previous management reviews; and
- f) be conducted annually or on a more frequent basis as appropriate.

5.2 Continual improvement

Management review shall include assessing opportunities for continual improvement. The organization should continually improve the effectiveness of the OHSMS.

When identifying opportunities for continual improvement, the organization should consider:

- a) the OHS policy and objectives and targets;
- b) results of hazard and risk identifications and assessments;
- c) results of performance monitoring and measurements;
- d) investigation of work-related injuries and illness, as well as the results and recommendations of audits;
- e) outcomes of the management review;
- f) corrective and preventive actions;
- g) recommendations for improvement from workers and worker representatives;
- h) changes in OHS legal requirements, OHS provisions of collective agreements, and other OHS requirements to which the organization subscribes;
- i) new relevant information; and
- j) results of health protection and promotion programs.



- 1) Has senior management reviewed the organization's OHSMS at planned intervals to ensure its continued suitability, adequacy and effectiveness?
- 2) Has the management review assessed opportunities for continual improvement?

5.3 Review input

The input to management review shall include the following OHS information:

- a) results of audits,
- b) communication received from workers and worker representatives,
- c) communication received from external interested parties,
- d) the performance of the OHSMS, including an analysis of the results of investigation of work-related injuries, illnesses and OHS incidents,
- e) the extent to which objectives and targets have been met,
- f) status of corrective and preventive actions,
- g) follow-up actions from previous management reviews,
- h) changing circumstances, and
- i) recommendations for improvement.

Management review of the OHSMS is a cumulative and on-going process. Management should focus on trends that may indicate problems with the OHSMS, however the review should also consider inputs that while not a trend may be significant enough to indicate a potential gap in the OHSMS.

Inputs to management reviews may also include:

- a) the organizational structure, including its staffing and other resources,
- b) compliance with OHS policy,
- c) training programs,
- d) minutes from workplace health and safety committee meetings,
- e) government agency interventions, including inspections, orders and prosecutions,
- f) work refusals, and
- g) any other significant OHS issues.



- 1) Does the input to the management review include:
 - a) results of audits?
 - b) communication received from workers, worker representatives, and external interested parties?
 - c) results of investigations of work-related injuries, illnesses and OHS incidents?
 - d) information on the status of objectives and targets?
 - e) information on the status of corrective and preventive actions?
 - f) follow-up actions from previous management reviews?
 - g) recommendations for improvement?

5.4 Review output

The outputs from the management review shall include any decisions and actions related to:

- e) the need for changes to the organization's OHS policy and objectives,
- f) improvements to the effectiveness of the OHSMS and its processes,
- g) the extent to which objectives and targets have been met, and
- h) allocation of resources.

Action items shall be developed from the management review. The organization shall have a process for recording and communicating the findings, conclusions and action plans of the management review to the persons responsible for action and to workers and worker representatives.

Recommendations for improvement may be directed at changes to the OHSMS, including the organization's policies, objectives and targets, procedures or practices, and the allocation and use of the human and financial resources. A time frame should be established for implementation of any action items arising from management review. The effectiveness of any changes should be evaluated.



- 1) Does the output of the management review include decisions and actions related to:
 - a) the need for changes to the organization's OHS policy and objectives?
 - b) improvements to the effectiveness of the OHSMS and its processes?
 - c) allocation of resources?
- 2) Have action items been developed from the findings of the management review?
- 3) Are the findings of the management review recorded and provided to the persons responsible for action and to workers and worker representatives?

ANNEX B (Informative)

Internet Resources

Websites

- Federal government:
Human Resources and Skills Development Canada www.hrsdc.gc.ca
- Provincial and territorial websites:
 - Alberta www.gov.ab.ca/hre
 - British Columbia www.worksafebc.com/
 - Manitoba www.gov.mb.ca/labour/
 - New Brunswick www.whscc.nb.ca
 - Newfoundland & Labrador www.hrle.gov.nl.ca/hrle/
 - Nova Scotia www.gov.ns.ca/enla/
 - Ontario www.gov.on.ca/LAB/
 - Prince Edward Island www.wcb.pe.ca
 - Québec www.csst.qc.ca/
 - Saskatchewan www.labour.gov.sk.ca/

 - Northwest Territories/Nunavut www.wcb.nt.ca
 - Yukon Territory www.wcb.yk.ca/
- Standards development organizations:
 - Bureau de Normalisation de Québec www.bnq.qc.ca
 - Canadian Standards Association www.csa.ca
 - Canadian General Standards Board www.pwgsc.gc.ca/cgsb/
 - Underwriters Laboratories Canada www.ulc.ca
- Industry and trade association codes:
 - Canadian Chemical Producers Association Responsible Care
www.ccpa.ca/ResponsibleCare/
- American Conference of Government Industrial Hygienists' Threshold Limit Values for Chemical Substances and Physical Agents in the Work Environment and Biological Exposure Indices - www.acgih.org/Products/tlvintro.htm
- Guidelines and bulletins issued by the Canadian Centre for Occupational Health and Safety, labour organizations and safety associations.
www.ccohs.org
www.clc-ctc.ca

ANNEX C (Informative)

Correspondence between CSA Z1000 and other Related Standards and Guidelines

CSA Z1000		ANSI/AIHA Z10-2005	ILO OSH 2001	OHSAS 18001- 1999	ISO 14001-04
Scope	1	1	1	1	1
Reference publications	2			2	2
Terms and definitions	3	2	Glossary	3	3
OHSMS - general	4.1	3.1.1	3	4.1	4.1
Responsibility, accountability and authority	4.2.1.1	3.1.3	3.3	4.4.1	4.4.1
Representative of management	4.2.1.2		3.3.3	4.4.1	4.4.1
Worker participation	4.2.2	3.2	3.2		
OHS policy	4.2.3	3.1.2	3.1	4.2	4.2
Planning			3.8	4.3	4.3
Review	4.3.1	4.1	3.7		
Legal and other requirements	4.3.2			4.3.2	4.3.2
Hazard and risk identification and assessment	4.3.3	4.2	3.7.2 b)	4.3.1	4.3.1
Objectives and targets	4.3.4	4.3	3.9	4.3.3	4.3.3
Implementation	4.4	4.4 + 5.1			
Preventive and protective measures	4.4.1	5.1.1	3.10.1	4.4.6	4.4.6
Emergency prevention, preparedness and response	4.4.2	5.1.5	3.10.3	4.4.7	4.4.7
Competence and training	4.4.3	5.2	3.4	4.4.2	4.4.2
Communication and awareness	4.4.4	5.3	3.6	4.4.3	4.4.3
Procurement	4.4.5.1	5.1.3	3.10.4		
Contractors	4.4.5.2	5.1.4	3.10.5		
Management of change	4.4.6	5.1.2	3.10.2		
Documentation	4.4.7	5.4	3.5.1	4.4.4	4.4.4
Control of documents	4.4.7.1	5.4	3.5.2	4.4.5	4.4.5
Control of records	4.4.7.2	5.4	3.5.3	4.5.3	4.5.4
Evaluation and corrective action	4.5	6		4.5	4.5
Monitoring and measurement	4.5.1	6.1	3.11	4.5.1	4.5.1
Injury and incident investigation and root cause analysis	4.5.2	6.2	3.12	4.5.2	
Audits	4.5.3	6.3	3.13	4.5.4	4.5.5
Preventive and corrective action	4.5.4	6.4	3.15		4.5.3
Management review – general	5.1	7.1	3.14	4.6	4.6
Continual improvement	5.2	4.3	3.16	4.6	4.6
Review input	5.3	7.1	3.14.3		4.6
Review output		7.2	3.14.4		4.6

