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Occupational health and safety management - Guidelines on performance evaluation

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Titre manque

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Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular, the different approval criteria needed for the different types of ISO documents should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see www.iso.org/directives).

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Any trade name used in this document is information given for the convenience of users and does not constitute an endorsement.

For an explanation of the voluntary nature of standards, the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the World Trade Organization (WTO) principles in the Technical Barriers to Trade (TBT), see www.iso.org/iso/foreword.html.

This document was prepared by Technical Committee ISO/TC 283 Occupational health and safety management. This is the first edition of this document.

A list of all parts in the ISO 45001 series can be found on the ISO website.

Any feedback or questions on this document should be directed to the user's national standards body. A complete listing of these bodies can be found at www.iso.org/members.html.

Introduction

This document is intended to help organizations to effectively monitor, measure, analyse and evaluate occupational health and safety (OH&S) performance.

OH&S performance evaluation includes the processes that the organization chooses to assess the adequacy of activities that are expected to achieve OH&S intended results. OH&S performance is normally evaluated by using a combination of processes and sources of information such as incident investigation, inspections, audits, qualitative and quantitative indicators, culture surveys and interviews.

This document provides guidance on performance evaluation processes, including:

- selection and use of performance indicators;
- monitoring, measuring, analysing and evaluating data;
- unintended consequences;
- limitations, such as under-reporting over-reporting and data distortion.

This document can be used by organizations of all types, regardless of whether they have implemented a formal OH&S management system.

This document provides examples which demonstrate how to evaluate performance to drive improvements and create safer and healthier workplaces, better protect workers, and support the organization in achieving its intended results.

This document recommends a balanced approach based on selection of performance evaluation processes and indicators, with emphasis on proactive (leading) OH&S performance indicators. It recognizes that over-emphasis on past performance (lagging) indicators, such as incidence and frequency rates, can undermine efforts to improve OH&S performance.

As every organization is unique, and OH&S intended results vary, there is not a standardized set of performance evaluation processes or set of indicators that fulfil the needs of all organizations. Therefore, every organization has to identify performance evaluation processes and indicators to suit its needs.

Effective performance evaluation can help the organization to achieve continual improvement, but the way it is carried out can also produce unintended consequences. The most common of these consequences are discussed in this document.

This document is designed to complement ISO 45001 by providing performance evaluation approaches that align with requirements of that standard. This document can be used independently, by any organization, to improve OH&S performance.

Occupational health and safety management — Guidelines on performance evaluation

1 Scope

This document provides guidance on how to assess occupational health and safety (OH&S) performance, through the selection and use of performance evaluation processes and indicators, and by monitoring, measuring, analysing, and evaluating the data obtained. It enables organizations to determine if intended results are being achieved, including continual improvement of OH&S performance.

This document is applicable to all organizations regardless of type, industry sector, level of risk, size, or location. It can be used independently or as part of OH&S management systems, including those based on ISO 45001:2018, or other standards or guidelines.

2 Normative references

There are no normative references in this document.

3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 45001:2018 and the following apply.

ISO and IEC maintain terminology databases for use in standardization at the following addresses:

- ISO Online browsing platform: available at <https://www.iso.org/obp>
- IEC Electropedia: available at <https://www.electropedia.org/>

3.1

measurement

process to determine a value

Note 1 to entry: measurement can relate to managing activities, processes, products, services, systems or organizations.

[SOURCE: ISO 45001:2018, 3.31, modified: Note 1 deleted. New note 1 added]

3.2

indicator

variable that can be measured or described, representing the status or a characteristic of operations, processes, management, and conditions or outcomes

Note 1 to entry: indicators are generally measurable and can be quantitative or qualitative.

Note 2 to entry: lagging indicators relate to past performance.

Note 3 to entry: leading indicators relate to factors that can influence performance.

Note 4 to entry: some organizations use the term “metric” instead of “indicator”.

Note 5 to entry: significant indicators used to direct decision making by top management are sometimes referred to as a key performance indicators (KPIs).

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4 Performance evaluation

4.1 What performance evaluation is

Performance evaluation is a process or set of processes that compares performance achieved against OH&S intended results and is achieved through a process or set of processes. The organization's intended results can include continual improvement of OH&S performance, achievement of OH&S objectives, and fulfilment of legal requirements and other requirements.

The organization should take into account that there are many sources of information that can provide input to performance evaluation (see [5.3](#)). The organization should consider using a variety of sources of information as inputs to achieve a more comprehensive assessment, as a single source used in isolation can lead to an incomplete or inaccurate assessment.

4.2 Why performance evaluation is important

— The intent of performance evaluation is to assist the organization in determining the extent to which intended results are being achieved.

Performance evaluation allows the organization to determine, for example:

- a) which processes are achieving planned results and which are not;
- b) the degree of variation in processes or activities that affect OH&S performance and the causes of those variations;
- c) if there is a need for actions to improve processes;
- d) if top management is demonstrating support for OH&S.

Performance evaluation is essential to ensure that OH&S is being effectively managed and to inform decision-making.

5 The performance evaluation process

5.1 General

When implementing the performance evaluation process, the organization should take into account:

- a) its key processes, relevant to its context (e.g. working at height, permit to work, exposure assessment);
- b) the effectiveness of OH&S management, including hazard identification, assessment of risk and the effectiveness of risk controls;
- c) its conscious or unconscious assumptions about OH&S that influence organizational behaviour (e.g. incidents are always caused by unsafe behaviour by workers or a low incident rate always means the workplace is safe);
- d) organizational culture that influences behaviours that affect OH&S (e.g. reporting OH&S incidents or issues is encouraged and supported, without risk of reprisal);
- e) interdependencies within the system (e.g. the effectiveness of inspections depend on time available, training of inspectors and the willingness of workers to report issues to inspectors);
- f) processes within the individual elements of the management system that can impact OH&S performance.

NOTE 1 Examples of processes that can impact OH&S performance are provided in [Annex A](#).

5.2 Elements of performance evaluation

The organization should:

- a) determine the OH&S intended results;
- b) determine what should be done to achieve the intended results;
- c) choose the performance evaluation processes, sources of information and tools ([5.3](#));
- d) determine the information needed and whether it is possible to obtain it;
- e) measure, monitor, analyse and evaluate performance ([Clause 8](#));
- f) take action based on evaluation of performance ([8.7](#));
- g) review unintended consequences (see [7.1](#));
- h) take action to address issues identified through the review of the performance evaluation process and results (see [11](#)).

The organization should undertake specific performance evaluation processes to determine if the intended results are being achieved. The organization should take into account the types of activities being undertaken when considering the frequency and nature of performance evaluation processes.

For example, if the organization undertakes high-risk work it can monitor, measure and evaluate activities before, during and after the job, to gain information on performance at each stage of activity. If the organization undertakes lower-risk work or has processes that are unlikely to vary to a great degree, the monitoring can be less frequent.

5.3 Performance evaluation processes, sources of information and tools

5.3.1 General

The organization should determine the most effective performance evaluation processes and sources of information and tools in order to evaluate if intended results are being achieved. The organization should select indicators based on sources of information such as those described (see [5.3.2](#) to [5.3.12](#) inclusive). The organization should consider indicators based on OH&S process inputs such as training, risk assessments, contractor safety and management of change, or information gained from incidents such as near misses, overexposure to airborne contaminants, injuries, chemical spills or illnesses.

Further information on the selection and use of indicators is provided in [Clause 6](#).

The list of performance evaluation processes in [Clauses 5.3.2](#) to [5.3.12](#) contains many of the most common processes, however this list is not exhaustive. The organization should use additional processes appropriate to the nature of work, type of OH&S hazards and exposures, and level of risk.

5.3.2 Inspections

The organization can use inspections to, for example:

- a) observe how work is actually being done;
- b) gain both general and specific information (e.g. work conditions; if workers are using controls as intended; compliance with legal requirements);
- c) gain information on more than one aspect of OH&S performance at one time (e.g. correct use of PPE; operation of ventilation systems and other controls; how workers interact and collaborate; safe use of machinery or equipment; opportunities for improvement)
- d) gain insight into hazards and risks and why near misses or incidents happen;

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- e) review documented information related to work processes (e.g. breakdowns, product or service defects).

The organization should consider if it is useful to implement regular inspections for specific OH&S objectives (e.g. daily checks of safety-critical equipment such as cranes, ventilation, chemical enclosures or safety devices on power presses).

5.3.3 Interviews

The organization should consider the use of formal and informal interviews with workers at all levels to gather information on hazards, the effectiveness of controls, adverse health symptoms, recent experiences, how workers are feeling, their concerns, and ideas for improvement. The organization should provide interviewers with appropriate training and tools.

The organization should take into account:

- a) the importance of creating an environment where workers feel safe to answer, without fear of adverse consequence (e.g. embarrassment, threats, stigma, any type of reprisal);
- b) potential benefits of confidential one-to-one or small group discussions to encourage open and honest discussion;
- c) the need for interviewers to mainly ask open rather than closed questions to encourage the interviewee to share all relevant information;
- d) the need for interviewers to ask non-judgemental questions without bias or directing answers to a pre-determined conclusion;
- e) the importance of listening and documenting answers (if needed), accurately and objectively.

5.3.4 Surveys

The organization should consider using surveys to gain insight on aspects such as organizational culture, evaluation of performance related to internal and external issues, needs of interested parties, work environment, health and wellbeing, or how effective processes and controls are perceived to be.

Surveys can be performed at different levels of the organization and with relevant interested parties, depending on the subject of the survey. The organization should consider the use of anonymous surveys, when appropriate, for example for potentially sensitive issues, such as the work environment, psychological health and safety, effective leadership or potentially unsafe working practices.

NOTE Surveys can be helpful to clarify if concerns are limited to a small number of workers or more general.

5.3.5 Pre-activity and post-activity reviews

Pre-activity reviews (sometimes referred to as pre-job or pre-task reviews or dynamic risk assessments) and post-activity reviews (sometimes called post-job debriefs or after-action reviews) can be a rich source of performance evaluation information. The organization should consider the use of pre- and post-activity reviews, to gain information on aspects such as:

- a) resource issues, including the need for more workers or workers with different skills, equipment repair, availability and condition of safety-critical items such as ventilation systems, air quality monitoring and machine guards;
- b) competence gaps and the potential need for training;
- c) gaps in legal compliance;
- d) current working conditions;
- e) effectiveness of hazard identification and assessment of risks, and identification of opportunities;