



# ISO 55001

ITC STANDARD PREVIEW  
(standards.itc.ai)

## Asset management

[ISO 55001:2014](#)

<https://standards.iso.org/catalog/standards/sist/f4b6bcb7-d1d7-4f43-b259-98864347e66/iso-55001-2014>

**Management systems:  
Requirements**

First edition

2014-01-15



## Our vision

To be the world's leading provider of high quality, globally relevant International Standards through members and stakeholders.

## Our mission

ISO develops high quality voluntary International Standards that facilitate international exchange of goods and services, support sustainable and equitable economic growth, promote innovation and protect health, safety and the environment.

## Our process

Our standards are developed by experts all over the world who work on a volunteer or part-time basis. We sell International Standards to help recover the costs of organizing this process and making standards widely available.

Please respect our licensing terms and copyright to ensure this system remains independent.

If you would like to contribute to the development of ISO standards, please contact the ISO Member Body in your country:

<https://standards.iteh.ai/catalog/standards/sis/4600c67-61d7-443-0259-698864347e66/iso-55001-2014>  
[www.iso.org/iso/home/about/iso-members.htm](http://www.iso.org/iso/home/about/iso-members.htm)

## This document has been prepared by:

ISO/PC 251, *Asset management*.

## Committee members:

ABNT, AENOR, AFNOR, ANSI, BIS, BSI, DGN, DIN, ESMA, GOST R, ICONTEC, INDECOPI, INN, IPQ, IRAM, JISC, KATS, NBN, NEN, NSAI, SA, SABS, SAC, SCC, SFS, SIS, SN, SNV, UNI, UNMZ, IIOC (liaison organization).

*Cover photo credit: ISO/Central Secretariat.*

## Copyright protected document

© ISO 2014

All rights reserved. Unless otherwise specified, no part of this publication may be reproduced or utilized otherwise in any form or by any means, electronic or mechanical, including photocopying, or posting on the internet or intranet, without prior written permission. Permission can be requested from either ISO at the address below or ISO's member body in the country of the requester:

ISO copyright office  
Case postale 56 • CH-1211 Geneva 20  
Tel. +41 22 749 01 11  
Fax. +41 22 749 09 47  
E-mail [copyright@iso.org](mailto:copyright@iso.org)  
Web [www.iso.org](http://www.iso.org)

Published in Switzerland.

## Executive summary

- An asset is something that has potential or actual value to an organization.
- Effective and efficient asset management enables an organization to achieve its objectives.
- The application of an asset management system provides assurance that those objectives can be achieved consistently and sustainably over time.
- Asset management allows an organization to examine the need for, and performance of, assets and asset systems at different levels.
- Aligning the asset management objectives with the organizational objectives, as well as linking asset reports to financial reports, can improve the organization's effectiveness and efficiency.
- The benefits of asset management can include: improved financial performance; managed risk; improved services and outputs; demonstrated social responsibility; demonstrated compliance; enhanced reputation; improved organizational sustainability; improved efficiency and effectiveness.

<https://standards.iteh.ai/catalog/standards/sist/f4b6bcb7-d1d7-4f43-b259-698864347e66/iso-55001-2014>

<b>Contents</b>	<b>Page</b>
<b>Foreword</b> .....	<b>5</b>
<b>Introduction</b> .....	<b>6</b>
<b>1 Scope</b> .....	<b>7</b>
<b>2 Normative reference</b> .....	<b>7</b>
<b>3 Terms and definitions</b> .....	<b>7</b>
<b>4 Context of the organization</b> .....	<b>7</b>
4.1 Understanding the organization and its context.....	7
4.2 Understanding the needs and expectations of stakeholders.....	7
4.3 Determining the scope of the asset management system.....	7
4.4 Asset management system.....	8
<b>5 Leadership</b> .....	<b>8</b>
5.1 Leadership and commitment.....	8
5.2 Policy.....	8
5.3 Organizational roles, responsibilities and authorities.....	9
<b>6 Planning</b> .....	<b>9</b>
6.1 Actions to address risks and opportunities for the asset management system.....	9
6.2 Asset management objectives and planning to achieve them.....	9
<b>7 Support</b> .....	<b>10</b>
7.1 Resources.....	10
7.2 Competence.....	11
7.3 Awareness.....	11
7.4 Communication.....	11
7.5 Information requirements.....	11
7.6 Documented information.....	12
<b>8 Operation</b> .....	<b>13</b>
8.1 Operational planning and control.....	13
8.2 Management of change.....	13
8.3 Outsourcing.....	13
<b>9 Performance evaluation</b> .....	<b>13</b>
9.1 Monitoring, measurement, analysis and evaluation.....	13
9.2 Internal audit.....	14
9.3 Management review.....	14
<b>10 Improvement</b> .....	<b>15</b>
10.1 Nonconformity and corrective action.....	15
10.2 Preventive action.....	15
10.3 Continual improvement.....	15
<b>Annex A (informative) Information on asset management activities</b> .....	<b>16</b>
<b>Bibliography</b> .....	<b>18</b>

## 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](http://www.iso.org/directives)).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights. Details of any patent rights identified during the development of the document will be in the Introduction and/or on the ISO list of patent declarations received (see [www.iso.org/patents](http://www.iso.org/patents)).

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

For an explanation on the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the WTO principles in the Technical Barriers to Trade (TBT) see the following URL: [Foreword - Supplementary information](#)

The committee responsible for this document is Project Committee ISO/PC 251, *Asset management*.

## Introduction

This International Standard specifies the requirements for the establishment, implementation, maintenance and improvement of a management system for asset management, referred to as an “asset management system”.

This International Standard can be used by any organization. The organization determines to which of its assets this International Standard applies.

This International Standard is primarily intended for use by:

- those involved in the establishment, implementation, maintenance and improvement of an asset management system;
- those involved in delivering asset management activities and service providers;
- internal and external parties to assess the organization’s ability to meet legal, regulatory and contractual requirements and the organization’s own requirements.

The order in which requirements are presented in this International Standard does not reflect their importance or imply the order in which they are to be implemented.

Further guidance regarding the application of the requirements within this International Standard is provided in ISO 55002.

General information on asset management, and information on the terminology applicable to this International Standard, is provided in ISO 55000. Organizations can find that consideration of the principles will assist the development of asset management in their organization.

This International Standard applies the definition of “risk” given in ISO 31000:2009 and ISO Guide 73:2009. In addition, it uses the

term “stakeholder” rather than “interested party”.

This International Standard is designed to enable an organization to align and integrate its asset management system with related management system requirements.

[Annex A](#) provides additional information on areas related to asset management activities.

iTeh STANDARD PREVIEW  
(standards.iteh.ai)

ISO 55001:2014

<https://standards.iteh.ai/catalog/standards/sist/f4b6bcb7-d1d7-4f43-b259-595e24347e66/iso-55001-2014>

## 1 Scope

This International Standard specifies requirements for an asset management system within the context of the organization.

This International Standard can be applied to all types of assets and by all types and sizes of organizations.

**NOTE 1** This International Standard is intended to be used for managing physical assets in particular, but it can also be applied to other asset types.

**NOTE 2** This International Standard does not specify financial, accounting or technical requirements for managing specific asset types.

**NOTE 3** For the purposes of ISO 55000, ISO 55002 and this International Standard, the term “asset management system” is used to refer to a management system for asset management.

## 2 Normative reference

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 55000:2014, *Asset management — Overview, principles and terminology*

## 3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 55000 apply.

## 4 Context of the organization

### 4.1 Understanding the organization and its context

The organization shall determine external and internal issues that are relevant to its purpose and that affect its ability to achieve the

intended outcome(s) of its asset management system.

Asset management objectives, included in the strategic asset management plan (SAMP), shall be aligned to, and consistent with, the organizational objectives.

### 4.2 Understanding the needs and expectations of stakeholders

The organization shall determine:

- the stakeholders that are relevant to the asset management system;
- the requirements and expectations of these stakeholders with respect to asset management;
- the criteria for asset management decision making;
- the stakeholder requirements for recording financial and non-financial information relevant to asset management, and for reporting on it both internally and externally.

### 4.3 Determining the scope of the asset management system

The organization shall determine the boundaries and applicability of the asset management system to establish its scope. The scope shall be aligned with the SAMP and the asset management policy. When determining this scope, the organization shall consider:

- the external and internal issues referred to in [4.1](#);
- the requirements referred to in [4.2](#);
- the interaction with other management systems, if used.

The organization shall define the asset portfolio covered by the scope of the asset management system.

The scope shall be available as documented information.

#### 4.4 Asset management system

The organization shall establish, implement, maintain and continually improve an asset management system, including the processes needed and their interactions, in accordance with the requirements of this International Standard.

The organization shall develop a SAMP which includes documentation of the role of the asset management system in supporting achievement of the asset management objectives.

### 5 Leadership

#### 5.1 Leadership and commitment

Top management shall demonstrate leadership and commitment with respect to the asset management system by:

- ensuring that the asset management policy, the SAMP and asset management objectives are established and are compatible with the organizational objectives;
- ensuring the integration of the asset management system requirements into the organization's business processes;
- ensuring that the resources for the asset management system are available;
- communicating the importance of effective asset management and of conforming to the asset management system requirements;
- ensuring that the asset management system achieves its intended outcome(s);
- directing and supporting persons to contribute to the effectiveness of the asset management system;

- promoting cross-functional collaboration within the organization;
- promoting continual improvement;
- supporting other relevant management roles to demonstrate their leadership as it applies to their areas of responsibility;
- ensuring that the approach used for managing risk in asset management is aligned with the organization's approach for managing risk.

**NOTE** Reference to "business" in this International Standard can be interpreted broadly to mean those activities that are core to the purposes of the organization's existence.

#### 5.2 Policy

Top management shall establish an asset management policy that:

- a) is appropriate to the purpose of the organization;
- b) provides a framework for setting asset management objectives;
- c) includes a commitment to satisfy applicable requirements;
- d) includes a commitment to continual improvement of the asset management system.

The asset management policy shall:

- be consistent with the organizational plan;
- be consistent with other relevant organizational policies;
- be appropriate to the nature and scale of the organization's assets and operations;
- be available as documented information;
- be communicated within the organization;
- be available to stakeholders, as appropriate;



- be implemented and be periodically reviewed and, if required, updated.

### 5.3 Organizational roles, responsibilities and authorities

Top management shall ensure that the responsibilities and authorities for relevant roles are assigned and communicated within the organization.

Top management shall assign the responsibility and authority for:

- establishing and updating the SAMP, including asset management objectives;
- ensuring that the asset management system supports delivery of the SAMP;
- ensuring that the asset management system conforms to the requirements of this International Standard;
- ensuring the suitability, adequacy and effectiveness of the asset management system;
- establishing and updating the asset management plan(s) (see 6.2.2);
- reporting on the performance of the asset management system to top management.

## 6 Planning

### 6.1 Actions to address risks and opportunities for the asset management system

When planning for the asset management system, the organization shall consider the issues referred to in 4.1 and the requirements referred to in 4.2 and determine the risks and opportunities that need to be addressed to:

- give assurance that the asset management system can achieve its intended outcome(s);

- prevent, or reduce undesired effects;
- achieve continual improvement.

The organization shall plan:

- actions to address these risks and opportunities, taking into account how these risks and opportunities can change with time;
- how to:
  - integrate and implement the actions into its asset management system processes;
  - evaluate the effectiveness of these actions.

### 6.2 Asset management objectives and planning to achieve them

#### 6.2.1 Asset management objectives

The organization shall establish asset management objectives at relevant functions and levels.

When establishing its asset management objectives, the organization shall consider the requirements of relevant stakeholders and of other financial, technical, legal, regulatory and organizational requirements in the asset management planning process.

The asset management objectives shall:

- be consistent and aligned with the organizational objectives;
- be consistent with the asset management policy;
- be established and updated using asset management decision-making criteria (see 4.2);
- be established and updated as part of the SAMP;

- be measurable (if practicable);
- take into account applicable requirements;
- be monitored;
- be communicated to relevant stakeholders;
- be reviewed and updated as appropriate.

The organization shall retain documented information on the asset management objectives.

### 6.2.2 Planning to achieve asset management objectives

The organization shall integrate the planning to achieve asset management objectives with other organizational planning activities, including financial, human resources and other support functions.

The organization shall establish, document and maintain asset management plan(s) to achieve the asset management objectives. These asset management plan(s) shall be aligned with the asset management policy and the SAMP.

The organization shall ensure that the asset management plan(s) take(s) into account relevant requirements coming from outside the asset management system.

When planning how to achieve its asset management objectives, the organization shall determine and document:

- a) the method and criteria for decision making and prioritizing of the activities and resources to achieve its asset management plan(s) and asset management objectives;
- b) the processes and methods to be employed in managing its assets over their life cycles;
- c) what will be done;
- d) what resources will be required;
- e) who will be responsible;

- f) when it will be completed;
- g) how the results will be evaluated;
- h) the appropriate time horizon(s) for the asset management plan(s);
- i) the financial and non-financial implications of the asset management plan(s);
- j) the review period for the asset management plan(s) (see 9.1);
- k) actions to address risks and opportunities associated with managing the assets, taking into account how these risks and opportunities can change with time, by establishing processes for:

- identification of risks and opportunities;
- assessment of risks and opportunities;
- determining the significance of assets in achieving asset management objectives;
- implementation of the appropriate treatment, and monitoring, of risks and opportunities.

The organization shall ensure that its asset management related risks are considered in the organization's risk management approach including contingency planning.

**NOTE** See ISO 31000 for further guidance on risk management

## 7 Support

### 7.1 Resources

The organization shall determine and provide the resources needed for the establishment, implementation, maintenance and continual improvement of the asset management system.

The organization shall provide the resources required for meeting the asset management objectives and for implementing the activities specified in the asset management plan(s).

## 7.2 Competence

The organization shall:

- determine the necessary competence of person(s) doing work under its control that affects its asset performance, asset management performance and asset management system performance;
- ensure that these persons are competent on the basis of appropriate education, training, or experience;
- where applicable, take actions to acquire the necessary competence, and evaluate the effectiveness of the actions taken;
- retain appropriate documented information as evidence of competence;
- periodically review current and future competency needs and requirements.

**NOTE** Applicable actions can include, for example: the provision of training to, the mentoring of, or the re-assignment of currently employed persons; or the hiring or contracting of competent persons. [ISO 55001:2014](https://standards.iteh.ai/catalog/standards/sist/f4b6bcb7-d1d7-4f43-b259-698864347e66/iso-55001-2014)

## 7.3 Awareness

Persons doing work under the organization's control, who can have an impact on the achievement of the asset management objectives, shall be aware of:

- the asset management policy;
- their contribution to the effectiveness of the asset management system, including the benefits of improved asset management performance;
- their work activities, the associated risks and opportunities and how they relate to each other;
- the implications of not conforming to the asset management system requirements.

## 7.4 Communication

The organization shall determine the need for internal and external communications relevant to assets, asset management and the asset management system including:

- on what it will communicate;
- when to communicate;
- with whom to communicate;
- how to communicate.

## 7.5 Information requirements

The organization shall determine its information requirements to support its assets, asset management, asset management system and the achievement of its organizational objectives. In doing this:

- a) the organization shall include consideration of:
  - the significance of the identified risks;
  - the roles and responsibilities for asset management;
  - the asset management processes, procedures and activities;
  - the exchange of information with its stakeholders, including service providers;
  - the impact of quality, availability and management of information on organizational decision making;
- b) the organization shall determine:
  - the attribute requirements of identified information;
  - the quality requirements of identified information;
  - how and when information is to be collected, analysed and evaluated;