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Sustainable cities and communities — Transforming our cities — Guidance for practical local implementation of ISO 37101

Villes et communautés territoriales durables — Transformer nos villes — Document d'orientation pour la mise en oeuvre pratique de l'ISO 37101 au plan local

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Foreword

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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).

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).

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 268, Sustainable cities and communities.

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.

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Introduction

The unprecedented growth in urban population across the globe presents massive challenges to governments and their citizens. At the same time, this trend offers an opportunity to find new ways of managing cities and the overall impact of human settlements on the environment, respecting planetary boundaries¹⁾, addressing in particular climate change and loss of biodiversity. Accordingly, many communities, both large and small, are therefore committed to sustainable development.

On 25 September 2015, many countries through the United Nations committed to adopting 17 sustainable development goals (SDGs) addressing a broad range of development issues, including ending poverty, protecting the planet and ensuring sustainable levels of prosperity for all²). Each goal has specific targets to be achieved by 2030. However, UN SDG 11b specifies that by 2020 cities should embark on integrated policies and plans towards inclusion, resource efficiency, mitigation and adaptation to climate change, and resilience to disaster. Achieving these goals requires coordinated work by governments, the private sector, civil society and citizens. Cities, in particular, are key sites of, and actors in, sustainable development. Local governments play a key organizing role in building more sustainable and desirable collective futures. ISO 37101 refers to the SDGs: "When evaluating the contribution to achieve the six purposes of sustainability, taking into account the twelve sustainability areas of action, the organization shall *consider the UN SDGs* (in particular Goal 11), as well as their **potential implementation** in communities".

ISO 37101 is a management system standard for communities that commit to the sustainable development of their administrative area or territory. This document applies ISO 37101 to specific types of communities: cities, towns, villages or other kinds of human settlements with territorial boundaries and administrative authority. Building on and operationalizing the general requirements set out in ISO 37101, this document offers practical guidance to all types of cities and other settlements on initiating, planning, implementing, measuring and managing sustainable development activities in a way that is holistic, inclusive and based on sustainability principles. Successful sustainable development should deliver well integrated environmental and societal outcomes (social cohesion, economic stability and people's quality of life), and other long-lasting benefits.

The purpose of this document is to guide organizing bodies, usually local governments, in their efforts to stimulate and coordinate sustainable development. This document is primarily designed to assist with city-wide strategies. Other ISO standards might apply or other guidance might be developed for schemes on a broader or smaller scale. This document helps cities to raise questions without necessarily providing standardized answers. It provides a common framework that facilitates exchange and communication.

This document recommends the different steps that local governments should take to ensure that, in their city or community, their actions contribute to the achievement of the six purposes of sustainable development set out in ISO 37101. It applies the ISO 37101 Plan-Do-Check-Act systems approach (PDCA) to local governments. PDCA is a management methodology of five steps, based on political commitment, used to ensure the continuous improvement of a wide range of complex processes. This document also gives guidance for establishing, implementing, maintaining and continually improving such a management system to enable local governments to follow a systematic approach to sustainable development.

ISO 37101 and this document coalesce around *six main purposes* that typically express and underpin the values of communities that wish to develop sustainably: overall attractiveness, the preservation and improvement of the environment, resilience, responsible resource use, social cohesion and the wellbeing of citizens. These purposes are explored across *12 closely relevant sustainable development areas of action*.

¹⁾ See ISO 37101:2016, Introduction.

²⁾ See UN Report 'Transforming our world: the 2030 agenda for sustainable development', https://sustainabledevelopment.un.org/post2015/transformingourworld/publication. Use of the word 'transforming' in the title of the current document represents a direct connection to this UN report, seeking to highlight the role of cities in securing the broad transformation required by the SDGs.

In addition to recommendations for the use of a management system approach, this document provides local governments with a methodological framework based on cross-tabulation of the purposes and areas of action that allows users to explore systematically whether existing and new strategies, programs, plans or services inter-connect and make a positive contribution to the sustainable development of cities and other settlements.

Following the introductory clauses outlining the scope of this document (<u>Clause 1</u>), relevant normative references (<u>Clause 2</u>) and a set of terms and definitions drawn principally from ISO 37101 (<u>Clause 3</u>), this document identifies three main components for successful implementation of a management system for sustainable development, as described in <u>Figure 1</u>:

- 1) In <u>Clause 4</u>, a **political commitment** that supposes:
 - city council leadership of a scheme and the expression of a vision for its implementation;
 - one organization in charge of the management of the scheme;
 - involvement of all relevant interested parties;
 - awareness, capacity building and reinforcement of staff competencies.
- 2) In <u>Clause 5</u>, a **management system of the scheme** that mobilizes all relevant fields for the sustainable development of cities, cross-analysing the 12 areas of action and six purposes, with four main stages:
 - baseline review;
 - establishing the strategy, which includes identifying and prioritizing the objectives according
 to the policy, that provides the global vision, conformity obligations, resources and their
 contribution to the six purposes;
 - establishing the action plan; ment Preview
 - conducting evaluation of performance and continual improvement.
- 3) In <u>Clause 6</u>, robust **support for the management system** that ensures:
 - mobilization of adequate resources;
 - a communication plan at each stage of the process:
 - a record of the documented information.

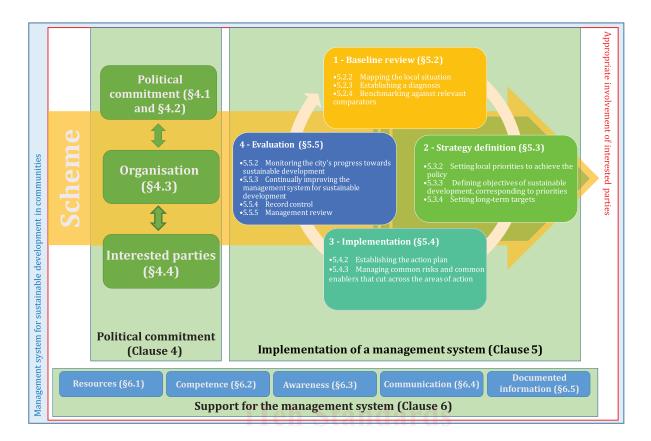


Figure 1 — Key steps of the management system

The "cross-analysis" of purposes and areas of action is a useful tool to support integrated implementation of the UN SDGs, especially Goal 11, as <u>Annex A</u> explains.

Annex B provides examples from cities which have implemented management practices in line with ISO 37101.

<u>Annex C</u> provides a national example of use of the cross-analysis matrix.

ISO 371xx family

ISO 37101 and this document are part of the ISO 371xx family which aims to foster the exchange of experiences at national and international levels. The family is an open framework, allowing the inclusion of a wide range of supporting documentation, examples and references from many sources. This library will be added to, updated and revised over time. Note that neither this document nor any subsequent standards in the series are intended to introduce new requirements for certification beyond those contained in the over-arching ISO 37101 framework. Rather, this document provides a degree of practical substance and reference material that complements other ISO 371xx standards.

Sustainable cities and communities — Transforming our cities — Guidance for practical local implementation of ISO 37101

1 Scope

This document provides guidance on how to implement and maintain a management system for sustainable development based on ISO 37101 principles, specifically in the context of cities, but applicable to other forms of settlement. This document:

- provides guidance for practical implementation of a management system for sustainable development in cities and other settlements, based on ISO 37101;
- establishes a methodological framework for the systematic evaluation of the sustainable development schemes and achievements in the city or other settlements, based on the cross-analysis of the six purposes of sustainability and the 12 areas of action of ISO 37101;
- illustrates how other International Standards can be used to support successful implementation of ISO 37101, including, in particular, ISO 37120 (which recommends a suite of city indicators mapped against the six purposes of ISO 37101) and ISO 37106 (which provides practical guidance on how to implement joined-up delivery and innovation across organizational boundaries within the city or settlement).

This document is intended for organizing bodies, decision-makers, executive officers and managers in cities – usually, in the first instance, the relevant local governments.

This document is intended to help cities become more sustainable, through the implementation at city level of strategies, programmes, projects, plans and services referred to in this document as schemes (see Note 1 and 3.7). It also provides a platform to help demonstrate and communicate their commitment, progress and achievements.

NOTE 1 In this document, the term "scheme" is used to cover strategies, programs, projects, plans and services.

NOTE 2 The guidance can be used for city-wide strategies, but also, potentially, for some sector-specific schemes at a city level.

This document is applicable to a range of types and scales of communities: cities, towns, villages or other kinds of human settlements with defined boundaries.

NOTE 3 In this document, the term "city" refers to cities, towns, villages or other kind of human settlements with defined territorial boundaries and administrative authority.

The approach is in line with other deliverables developed by ISO/TC 268 and ISO/TC 268/SC 1 that could be identified as the ISO 371XX family.

This document can be used in whole or in part to establish or systematically improve a community-based sustainable development management system. It provides additional operational instructions and examples regarding ways of meeting the 37101 requirements.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 37101, Sustainable development in communities — Management system for sustainable development — Requirements with guidance for use

3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO 37101 and the following apply.

Some definitions drawn from ISO 37101 might be restated for clarity, as necessary.

ISO and IEC maintain the following terminological databases for use in standardization:

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

3.1

purpose of sustainability

long-term sustainability goals that a city (3.6) seeks to achieve by using different methods and levers (i.e. the areas of action)

Note 1 to entry: In this document, "purpose" refers to purpose of sustainability.

Note 2 to entry: The six purposes allow cities to evaluate the impacts of different types of actions systematically.

Textbox: Focus on the six purposes of ISO 37101

Attractiveness

Including: potential for economic development; general appeal to citizens and investors; richness of culture, encouragement of creativity and innovation; established connectivity and the continual development of alternative forms of mobility (such as quality of sustainable public transport infrastructures).

Preservation and improvement of environment

Including: climate change mitigation (such as by reducing greenhouse gas emissions; preservation, restoration and enhancement of biological diversity and ecosystem services); protection of ecosystems, (including plant and animal diversity and migration as well as genetic diversity); reducing pollution (including improving air quality and reducing health hazard).

Resilience

Including: preparation for climate change adaptation; *climate* risk reduction actions and crisis management plans, *vulnerability assessment*, development of social capital and capability, demographic evolution; financial and economic shocks and stresses testing and organisational preparedness.

Responsible resource use

Including: improved land use management; reducing, reusing and recycling of materials; respect for scarcity of all types of resources (notably water and energy). *Promoting the environmentally safe reuse and recycling/treatment of e-waste and batteries. Encouraging preparation for reuse of products, and imposing conditions for the safe recycling, recovery and disposal of waste materials.*

Social cohesion

Including: Equitable accessibility to services; dialogue with external parties not limited by city boundaries, enhancing and celebrating diversity; heritage and building a sense of identity; inclusiveness; mutuality, and shared experiences; rootedness; sense of belonging and increasing opportunities for social mobility, cohesion and the reduction of inequalities. *Social cohesion is a relevant element of Agenda 2030 which focuses on reaching the SDGs. It is summed up by the phrase "Leave no one behind"*a.

Well-being

Including: access to quality-of-life opportunities; all-life education and job-related training, human capital improvement; healthy environment and liveable city; security; building self-confidence and collective maturity.

NOTE Three entries have been updated with the text in italics to reflect the latest international agreements and the current discussion on sustainable development efforts in cities and communities.

a "'Leaving no-one behind' goes well beyond being just an anti-discrimination agenda; it is a recognition that expectations of trickle-down progress are naïve, and that explicit and pro-active attempts are needed to ensure populations at risk of being left behind are included from the start. Key to 'leaving no-one behind' is the prioritization and fast-tracking of actions for the poorest and most marginalized people – known as progressive universalism." Overseas Development Institute, Defining 'leave no-one behind', Elizabeth Stuart and Emma Samman.

3.2

sustainability issue

area of action related to city services that:

- may have strategic, operational and competitive implications;
- helps organizing bodies such as local governments to achieve the purposes (3.1)

Note 1 to entry: throughout this document, "area of action" refers to ISO 37101:2016, 4.6.

Textbox: The 12 areas of action addressed in ISO 37101

Governance, empowerment and engagement

Including: actions aimed at involving the different local actors and encouraging them to work together on collaborative projects. Such actors might include public actors, private actors, universities and research, associations, charities and citizens.

Education and capacity building

Including: actions aimed at raising awareness, providing information, communication, education and training for different audiences and levels.

Innovation, creativity and research

Including: actions involving innovation, creativity and research. For example, the establishment of innovation clusters, places of physical and virtual exchanges, the definition of public policies to support the realization of innovative demonstrators in the territory.

NOTE Innovation can take many forms, including social, technological, organizational, economic and financial innovations.

Health and care in the community

Including: actions aimed at improving health and care in the community, with a particular emphasis on projects targeting the most vulnerable and fragile sections of the population (e.g. children, the elderly, people with disabilities, and people who are insecure, mentally ill or distressed) and also projects targeting areas that lack access to care and health facilities.

Culture and community identity

Including: actions aimed at supporting and promoting culture in its diversity, notably minority and marginalised cultures. It also concerns actions aimed at fostering meeting opportunities and exchanges between different cultures both inside and outside the territory.

Living together, interdependence and mutuality

Including: actions and mechanisms aimed at promoting equal treatment of all citizens. It also concerns actions that encourage living together, constructive challenge and policies reducing inequality in all its forms.

Economy and sustainable production and consumption

Including: actions aimed at promoting and fostering the development of sustainable production and consumption, for example by establishing rules governing public procurement.

Living and working environment

Including: actions in the field of construction or renovation of buildings and public spaces. Actions aimed at encouraging good appropriation of buildings and public space by different users (e.g. adaptability, flexibility and innovation).

Safety and security

Including: actions aimed at preventing and managing all types of risks, actions aimed at reducing the causes of delinquency and crime; actions to ensure general safety and security.

Biodiversity and ecosystem services

Including: actions aimed at protecting, integrating and promoting natural environments in the city and its surroundings, for example green spaces, landscapes, wetlands and aquatic environments, ecological corridors, fauna and flora. Actions aimed at better understanding and using the positive impact of diverse ecosystems.

Community smart infrastructures

Including: actions aimed at ensuring high-quality utilities, for example urban water supply services and wastewater treatment; collection and treatment of waste; production, transmission and distribution of energy (e.g. electricity, heat, cold); integration of internet and other communication services.

Mobility

Including: actions aimed at promoting the development of public transport, and of active and alternative transportation modes (e.g. electric cars, carpools). It includes actions aimed at fostering the integration of information technology in the management of mobility, the regulation of goods and people transportation (e.g. reduction of speed) and parking policy.

3.3

cross-analysis matrix

methodological tool for conducting a cross-analysis based on the six purposes of sustainability and the 12 areas of actions [iteh.ai/catalog/standards/iso/07570a8b-10a6-4934-990f-c197f6f97e15/iso-37104-201

Note 1 to entry: See <u>5.2.3</u> for a detailed description of how to use the cross-analysis matrix as a simple tool to perform the diagnosis. <u>Figure 2</u> illustrates the concept of a cross-analysis matrix.

3.4

city council

main organizing and decision-making body of the local government, especially the political lead

3.5

local government

part of government in a country or nation that is typically closest to the population, is in charge of managing, governing and promoting development of a local area, and is responsible for the definition, design, development and institutionalization of its public policies expressed in the provision of services to its citizens

Note 1 to entry: The basis for a local government can be, for example, a territorial division and the political and administrative organizations that are closest to the population. It is typically a public entity formed by territory, population, government and legislation. It normally has specific legal capacity and scope to determine its own political, administrative, cultural and historical heritage and regulatory capability.

Note 2 to entry: At the city level, the political lead is with the city council. The local government is responsible for the management system and for involving the different stakeholders.

[SOURCE: ISO 18091:2014, 3.5, modified — Note 2 to entry added.]

3.6

city

urban community falling under a specific administrative boundary

Note 1 to entry: In this document, the term city is taken to refer to cities, towns, villages or other kind of human settlements with defined boundaries.

[SOURCE: ISO 37101:2016, 3.3, modified — Notes to entry revised.]

3.7

scheme

strategy, program, project, plan or service to which this document is applicable

Note 1 to entry: The scope of the management system is a city-wide scheme such as a sustainable development plan, climate strategy, energy strategy, mobility plan or green area development plan. Some examples are provided in case studies in Annex B.

3.8

policy

intentions and direction of an organization, as formally expressed by its elected or accountable top management

3.9

strategy for sustainable development

strategic framework which supports a city's overall policy for sustainable development

3.10

objective

result to be achieved

Note 1 to entry: An objective can be strategic, tactical, or operational.

Note 2 to entry: Objectives can relate to different disciplines (such as financial, health and safety, and environmental goals) and can apply at different levels (such as strategic, organization-wide, project, product and process).

Note 3 to entry: An objective can be expressed in other ways, for example as an intended outcome, a purpose, an operational criterion, as an objective of sustainable development in communities, or by the use of other words with similar meaning (e.g. aim, ambition or goal).

Note 4 to entry: In the context of management systems for sustainable development in communities, objectives for sustainable development in communities are set by the organization, consistent with the policy for sustainable development in communities, to achieve specific results.

[SOURCE: ISO 37101:2016 3.26, modified — Notes to entry revised.]

3.11

interested party

stakeholder

person or <u>organization</u> that can affect, be affected by, or perceive itself to be affected by a decision or activity

Note 1 to entry: The term refers to the persons or organizations that are *effectively* affected or perceive themselves to be affected by a decision or activity. Stakeholders are the persons or organizations that *effectively participate* and engage themselves in processes of elaboration, implementation or evaluation.

[SOURCE: ISO 37100:2016, 3.2.5, modified — Note 1 to entry added.]

4 Political commitment: leadership, responsibilities, organization and capacity building

4.1 Local leadership in context

The context for the sustainable development of the city is set not only by municipalities, but by national and regional administrations in accordance with international agreements, national regulations, and regional, economic and budgetary policies. The relations between these different levels of government and administration need to be considered when addressing sustainable development of territories and cities. Cross-boundary issues and collaboration with neighbouring localities also need to be tackled.

Local governments have a key role in committing to and enacting local sustainable development. They usually decide on financial and budgetary matters, personnel changes, institutional reform and spatial and environmental planning, as well as natural resource substitution or management to deliver such a policy. They give a credible mandate for and initiate local implementation partnerships and ensure both initial stakeholder buy-in and their long-lasting engagement. They also evaluate achievements in relation to local or regional political commitments to sustainable development and, where necessary, may reconsider their sustainability pathway.

A council committed to sustainable development, and seeking to implement its commitments effectively, is advised to establish an integrated management system according to ISO 37101. In cities, formal political approval is required to officially launch a management system for sustainable development. The city council mandates its administrative body to organize and coordinate the management system for sustainable development, allocating appropriate resources, including staff and finances. Once a fundamental decision is reached and capacities and procedures for local sustainable development and resilience management have been established, formal decision-making is sought at frequent intervals during each agreed management period of this process.

Textbox: Role of politicians in sustainability management

- development of a vision, referred to in this document as the policy
- legitimization and mandate https://standards.iteli.ai/catalog/standards/iso/07570a8b-10a6-4934-990f-c197f6f97e15/iso-37104-2019
- resourcing of measures
- evaluation and accountability
- leadership in influencing public opinion and private companies in the role of chair or a member of business boards
- representation of a city to others externally

4.2 Political decision-making

A key factor in the successful elaboration and implementation of the management of sustainable development is the quality of political leadership. In order to assume a leadership role, the political decision-making body may demonstrate its commitment through the establishment of a common and public policy for sustainable development in the city. This policy is a brief and important document that specifies the expected outcomes and the values on which it is based; the relevant technical and geographical scope of the management system for sustainable development; and the commitment to allocate appropriate resources to elaborate, implement and continually improve it. The policy should normally establish innovative procedures and incentives to encourage sustainable endeavours. It should also ensure that measures towards sustainability are enacted broadly and regularly, which should involve and empower interested and affected parties.