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Foreword

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This document was prepared by Joint Technical Committee ISO/IEC JTC 1, *Information technology*.

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 and www.iec.ch/national-committees.

Introduction

Smart city digital platforms (SCDPs) aim to form a pragmatic development of information technology foundations that enable the integration of urban services. SCDPs are part of the digital transformation in urban infrastructure and services that is being driven by the deployment of the internet of things (IoT), artificial intelligence (AI), cloud computing, big data and digital twin solutions, and other digital technologies.

An SCDP is a space where different applications can share fundamental common resources and functions. It provides an interface to integrate a city's digital and physical infrastructure. It also provides integrated capability to coordinate data, services and applications across operational domains for multiple stakeholders in smart cities.

An SCDP is intended to help to break down the traditional system silos of a city by bringing connections between them. It looks beyond sectoral silos to reimagine existing systems, enable new processes and interactions, and migrate towards new forms of service delivery. The digital capabilities provided by SCDPs aim at connecting things, connecting data and connecting innovation. These capabilities are key criteria for enabling cities to build partnerships to ensure their economies, environment and services are fit for the future.

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1 Scope

This document specifies the reference architecture of smart city digital platforms (SCDPs), with a focus on supporting access to data and services for applications in smart cities.

2 Normative references

There are no normative references in this document.

3 Terms and definitions

For the purposes of this document, the following terms and definitions 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
asset
anything that has value to a stakeholder

[SOURCE: ISO 22739:2020, 3.1]

3.2
data
representation of facts of objective reality in a formalized manner

EXAMPLE Data can be signs and symbols, and can be in analogue form, digital form or both.

Note 1 to entry: Data can be used for communication, interpretation or processing by human beings or automatic means.

[SOURCE: IEC CDV 60050-831, 2.2]

3.3
information
structured, contextualized and processed data that are endowed with meaning

Note 1 to entry: Information is meaningful and useful to human beings, or machines or both.

3.4
interoperability
property permitting diverse systems or components to work together for a specified purpose

[SOURCE: IEC 80001-1:2010, 2.11]