
**Information technology — Internet of
media things —**

**Part 2:
Discovery and communication API**

*Technologies de l'information — Internet des objets media —
Partie 2: API pour la découverte et la communication*

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A list of all parts in the ISO/IEC 23093 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

The ISO/IEC 23093 series provides an architecture and specifies APIs and compressed representation of data flowing between media things.

The APIs for the media things facilitate discovering other media things in the network, connecting and efficiently exchanging data between media things. The APIs also provide means for supporting transaction tokens in order to access valuable functionalities, resources, and data from media things.

Media things related information consists of characteristics and discovery data, setup information from a system designer, raw and processed sensed data, and actuation information. The ISO/IEC 23093 series specifies data formats of input and output for media sensors, media actuators, media storages, media analyzers, etc. Sensed data from media sensors can be processed by media analyzers to produce analysed data, and the media analyzers can be cascaded in order to extract semantic information.

This document contains the APIs to discover media things in the network, and communicate between media things along with the APIs to facilitate transactions between media things.

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Information technology — Internet of media things —

Part 2:

Discovery and communication API

1 Scope

This document specifies the abstract class of a media thing (MThing), which is a basic component to construct Internet of media things. The MThing class contains the basic APIs to:

- discover other MThing(s) in the network;
- connect/disconnect MThing(s);
- support transactions (e.g. payments) using media tokens between MThings.

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/IEC 23093-1¹⁾, *Information technology — Internet of media things — Part 1: Architecture*

ISO/IEC 23093-3:—²⁾, *Information technology — Internet of media things — Part 3: Media data formats and API*

ISO/IEC 21000-7:2007, *Information technology — Multimedia framework (MPEG-21) — Part 7: Digital Item Adaptation*

3 Terms and definitions

For the purposes of this document, the terms and definitions given in ISO/IEC 23093-1 apply.

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

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

4 APIs

4.1 General

This clause specifies APIs to discover MThings, and connect/disconnect communication between MThings. In addition, APIs and return class types are specified to provide MThing information and hardware descriptions.

An MThing can be discovered by its capabilities and/or supported media token types. The discovered MThing(s) can then relay its (their) information to the requester (i.e. another MThing).

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