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Information technology — Multimedia application format (MPEG-A) —

Part 3: MPEG photo player application format

Technologies de l'information — Format pour application multimédia (MPEG-A) —

Partie 3: Format pour application "MPEG photo player"

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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
Web www.iso.org

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Foreword

ISO (the International Organization for Standardization) and IEC (the International Electrotechnical Commission) form the specialized system for worldwide standardization. National bodies that are members of ISO or IEC participate in the development of International Standards through technical committees established by the respective organization to deal with particular fields of technical activity. ISO and IEC technical committees collaborate in fields of mutual interest. Other international organizations, governmental and non-governmental, in liaison with ISO and IEC, also take part in the work. In the field of information technology, ISO and IEC have established a joint technical committee, ISO/IEC JTC 1.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 2.

The main task of the joint technical committee is to prepare International Standards. Draft International Standards adopted by the joint technical committee are circulated to national bodies for voting. Publication as an International Standard requires approval by at least 75 % of the national bodies casting a vote.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO and IEC shall not be held responsible for identifying any or all such patent rights.

ISO/IEC 23000-3 was prepared by Joint Technical Committee ISO/IEC JTC 1, *Information technology*, Subcommittee SC 29, *Coding of audio, picture, multimedia and hypermedia information*.

ISO/IEC 23000 consists of the following parts, under the general title *Information technology — Multimedia application format (MPEG-A)*:

— *Part 1: Purpose for multimedia application formats* [Technical Report]

— *Part 2: MPEG music player application format*

— *Part 3: MPEG photo player application format*

— *Part 4: Musical slide show application format*

Introduction

ISO/IEC 23000 (also known as “MPEG-A”) serves specific market needs by facilitating the swift development of innovative multimedia applications and services. Each part of the MPEG-A standard is created by combining selected existing technologies from the published MPEG standards into a multimedia application format (MAF). These are normative specifications of multimedia formats along with reference software implementations, allowing interoperability at the application level.

ISO/IEC 23000-3:2007 specifies a solution for digital photo-library applications. It was developed in response to the need for persistent and interoperable linking of digital image collections with metadata in order to support advanced access to content.

ISO/IEC 23000-3:2007 draws on three principal standards: JPEG for image-coding; MPEG-7 for metadata, and MPEG-4 file format for encapsulation. From these, it derives a flexible but simple structure to package images and their associated metadata. This allows users to annotate and organize images just as they could with proprietary software (or photo-sharing websites) but in a standard format which is interoperable across devices and platforms. It also allows conforming devices to support rich, content-enhanced functionality, including intelligent browsing, content-based search and automatic categorization.

Information technology — Multimedia application format (MPEG-A) —

Part 3:
MPEG photo player application format

1 Scope

This part of ISO/IEC 23000, also known as “photo player MAF”, specifies a file format for digital photo library applications. It establishes a standardized solution for the carriage of images and associated metadata, to facilitate simple and fully interoperable exchange across different devices and platforms. The set of metadata includes MPEG-7 visual content descriptions, as well as acquisition-based metadata (such as date, time and camera settings). This allows compliant devices to support new, content-enhanced functionality, such as intelligent browsing, content-based search or automatic categorization.

2 Normative references

The following referenced documents are indispensable for the application 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 10918-1, *Information technology — Digital compression and coding of continuous-tone still images: Requirements and guidelines*

ISO/IEC 10918-2, *Information technology — Digital compression and coding of continuous-tone still images: Compliance testing*

ISO/IEC 14496-12, *Information technology — Coding of audio-visual objects — Part 12: ISO base media file format*

ISO/IEC 14496-14, *Information technology — Coding of audio-visual objects — Part 14: MP4 file format*

ISO/IEC 15938-1, *Information technology — Multimedia content description interface — Part 1: Systems*

ISO/IEC 15938-2, *Information technology — Multimedia content description interface — Part 2: Description definition language*

ISO/IEC 15938-3, *Information technology — Multimedia content description interface — Part 3: Visual*

ISO/IEC 15938-5:2003, *Information technology — Multimedia content description interface — Part 5: Multimedia description schemes*

ISO/IEC 15938-10, *Information technology — Multimedia content description interface — Part 10: Schema definition*

ISO/IEC 21000-17, *Information technology — Multimedia framework (MPEG-21) — Part 17: Fragment Identification of MPEG Resources*