PD ISO/IEC TR 23008-13:2015

BSI Standards Publication

Information technology — High efficiency coding and media delivery in heterogeneous environments

Part 13: MMT implementation guidelines

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National foreword

This Published Document is the UK implementation of ISO/IEC TR 23008-13:2015.

The UK participation in its preparation was entrusted to Technical Committee IST/37, Coding of picture, audio, multimedia and hypermedia information.

A list of organizations represented on this committee can be obtained on request to its secretary.

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Compliance with a British Standard cannot confer immunity from legal obligations.

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Information technology — High efficiency coding and media delivery in heterogeneous environments —

Part 13: MMT implementation guidelines

Technologies de l'information — Codage à haute efficacité et livraison des medias dans des environnements hétérogènes —

Partie 13: Lignes directrices de mise en oeuvre du transport des medias MPEG

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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.

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 document 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).

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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 ISO/IEC JTC 1, *Information technology*, Subcommittee SC 29, *Coding of audio, picture, multimedia and hypermedia information*.

ISO/IEC 23008 consists of the following parts, under the general title *Information technology — High efficiency coding and media delivery in heterogeneous environments*:

— *Part 1: MPEG media transport (MMT)*

— *Part 2: High efficiency video coding*

— *Part 3: 3D Audio*

— *Part 4: MMT Reference and Conformance Software*

— *Part 5: Reference software for high efficiency video coding*

— *Part 8: Conformance Specification for HEVC*

— *Part 10: MPEG Media Transport Forward Error Correction (FEC) Codes*

— *Part 11: MPEG Media Transport Composition Information*

— *Part 12: Image file format*

— *Part 13: MMT implementation guidelines* [Technical Report]

Introduction

This part of ISO/IEC 23008 provides guidelines for implementation and deployment of multimedia systems based on the ISO/IEC 23008 standard. These guidelines include the following:

— guidelines on usage of MMT functions;

— guidelines on deployment use cases designed based on ISO/IEC 23008-1.

Information technology — High efficiency coding and media delivery in heterogeneous environments —

Part 13: MMT implementation guidelines

1 Scope

This part of ISO/IEC 23008 provides technical guidelines for implementing and deploying systems based on ISO/IEC 23008-1.

2 Normative references

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/IEC 23008–1:2014, *Information technology — High efficiency coding and media delivery in heterogeneous environments — Part 1: MPEG media transport (MMT)*

3 Terms, definitions, symbols and abbreviated terms

For the purposes of this document, the terms, definitions, symbols, and abbreviated terms in ISO/IEC 23008-1 apply.

4 Overview

4.1 System overview

This subclause describes the exemplary but typical system overview of MPEG Media Transport (MMT) as shown in Figure 1

The media origin provides A/V media or generic files to MMT sending entity in the form of Packages or Assets which are defined in ISO/IEC 23008-1. A Package is comprised of Assets, Presentation Information and Transparent Chanracteristics, etc. Physically, an Asset is a group of MPUs or generic files.

The MMT sending entity fragments MPU/generic files and generates MMTP packets to deliver A/V media data itself. Concurrently, it also generates signalling message for the successful delivery and presentation of A/V media included on that MMTP packet flow.

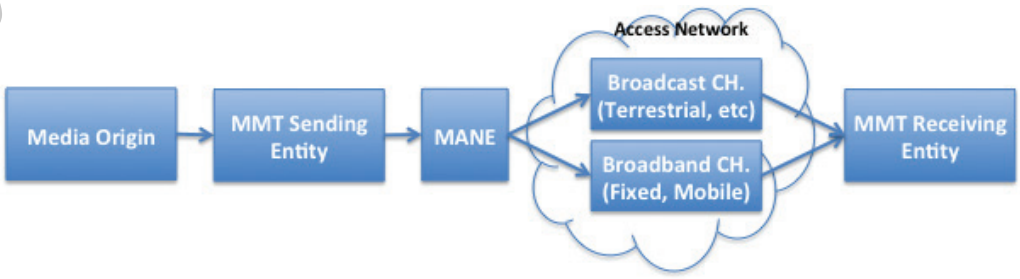

Figure 1 — Example of MMT-based media distribution chain