



Enabler Release Definition for DRM

Approved Version 1.0 – 25 June 2004

Open Mobile Alliance
OMA-ERELED-DRM-V1_0-20040625-A

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1. Scope

The scope of this document is limited to the Enabler Release Definition of Digital Rights Management (DRM) according to OMA Release process and the Enabler Release specification baseline listed in section 5.

The scope of OMA DRM includes the ability to preview media objects and to prevent downloaded content from being forwarded (copied) to other users. Preview and copy protection are part of DRM. A complete DRM technology is, however, **not** in scope of OMA DRM. These basic DRM features – preview and copy protection – are included because of the urgency to deploy a standardised solution.

2. References

2.1 Normative References

- [CREQ] “Specification of WAP Conformance Requirements”. Open Mobile Alliance™. WAP-221-CREQ. <http://www.openmobilealliance.org>
- [RFC2119] “Key words for use in RFCs to Indicate Requirement Levels”. S. Bradner. March 1997. <http://www.ietf.org/rfc/rfc2119.txt>
- [DRM] “Digital Rights Management”, Open Mobile Alliance™, OMA-Download-DRM-v1_0, <http://www.openmobilealliance.org/>
- [DRMREL] “DRM Rights Expression Language”, Open Mobile Alliance™, OMA-Download-DRMREL-v1_0, <http://www.openmobilealliance.org/>
- [DRMCF] “DRM Content Format”, Open Mobile Alliance™, OMA-Download-DRMCF-v1_0, <http://www.openmobilealliance.org/>

2.2 Informative References

- [ARCH] “Download Architecture”, Open Mobile Alliance™, OMA-Download-ARCH-v1_0, <http://www.openmobilealliance.org/>
- [RFC2396] “URI”, <http://www.ietf.org/rfc/rfc2396.txt>

3. Terminology and Conventions

3.1 Conventions

The key words “MUST”, “MUST NOT”, “REQUIRED”, “SHALL”, “SHALL NOT”, “SHOULD”, “SHOULD NOT”, “RECOMMENDED”, “MAY”, and “OPTIONAL” in this document are to be interpreted as described in [RFC2119].

All sections and appendixes, except “Scope” and “Introduction”, are normative, unless they are explicitly indicated to be informative.

The formal notation convention used in sections 7 and 9 to formally express the structure and internal dependencies between specifications in the Enabler Release specification baseline is detailed in [CREQ].

3.2 Definitions

Enabler Release

Collection of specifications that combined together form an enabler for a service area, e.g. a download enabler, a browsing enabler, a messaging enabler, a location enabler, etc. The specifications that are forming an enabler should combined fulfil a number of related market requirements.

Minimum Functionality Description

Description of the guaranteed features and functionality that will be enabled by implementing the minimum mandatory part of the Enabler Release.

3.3 Abbreviations

ERDEF	Enabler Requirement Definition
ERELD	Enabler Release Document
OMA	Open Mobile Alliance
DRM	Digital Rights Management

4. Introduction

This document outlines the Enabler Release Definition for DRM and the respective conformance requirements for clients and servers implementing claiming compliance to it as defined by Open Mobile Alliance across the specification baseline.

Digital Rights Management (DRM) is the means to control the usage of *media object* once it has been downloaded. DRM enables content providers to define *rights* for *media objects*. It is possible to associate different *rights* with a single *media object*. The *rights* are required in order to use the *media object*.

OMA DRM uses the following DRM components, found in most DRM systems:

- **Rights Expression Language.** Used to express *rights* and constraints governing the usage of the *media object* on the device.
- **Content format.** For usage in the DRM system. This comprises encryption of *media objects* using keys and a specified algorithm. Where no protection is deemed necessary, *media objects* may also be packaged as plaintext. A tool, the *DRM packager*, is used on the server to package media objects into the DRM format.
- **Metadata.** Data about the media object used to: (a) identify content (a URI [RFC2396]); and (b) help the user understand what the media object actually is (descriptive metadata). Media objects become part of the DRM system by optionally encrypting and packaging the media object into a DRM package.

5. Enabler Release Specification Baseline

The following specifications comprise the DRM enabler release:

“Download Architecture Version 1.0”	[ARCH]
“Digital Rights Management Version 1.0 “	[DRM]
“DRM Rights Expression Language Version 1.0”	[DRMREL]
“DRM Content Format Version 1.0 “	[DRMCF]

6. Minimum Functionality Description

This section is informative.

The minimum functionality for the DRM specifications includes:

- prevent forwarding of content if delivered in a DRM Message
- support for the “Content-Transfer-Encoding” and “Content-ID” headers in the DRM Message

The DRM specifications also define the following optional functionality:

- support for the combined delivery of rights and content
- support for separate delivery of rights and content, including superdistribution of said content
- control content usage based on the specified rights and constraints

7. Conformance Requirements Notation Details

This section is informative

The tables in following chapters use the following notation:

Item:

Entry in this column **MUST** be a valid ScrItem according to [CREQ].

Feature/Application:

Entry in this column **SHOULD** be a short descriptive label to the **Item** in question.

Status:

Entry in this column **MUST** accurately reflect the architectural status of the **Item** in question.

- M means the **Item** is mandatory for the class
- O means the **Item** is optional for the class
- NA means the **Item** is not applicable for the class

Requirement:

Expression in the column **MUST** be a valid TerminalExpression according to [CREQ] and it **MUST** accurately reflect the architectural requirement of the **Item** in question.

8. ERDEF for DRM – Client Requirements

Table 1 ERDEF for DRM Client-side Requirements

Item	Feature / Application	Status	Requirement
OMA-ERDEF-DRM-C-001	DRM Client	M	DRM:MCF

9. ERDEF for DRM – Server Requirements

The DRM Enabler Release does not specify server requirements.

Appendix A Change History

(Informative)

A.1 Approved Version History

Reference	Date	Description
OMA-ERELED-DRM-V1_0-20040615-A	15 Jun 2004	Initial document to address the basic starting point Ref TP Doc# OMA-TP-2004-0195-DRM-V1_0-for-final-approval
OMA-ERELED-DRM-V1_0-20040615-A	25 Jun 2004	Date changed to align with the correct version of [ARCH]

A.2 Draft/Candidate Version 1.0 History

Document Identifier	Date	Sections	Description
OMA-ERELED-DRM-V1_0-20021104-C	11 Nov 2002	n/a	Initial candidate spec
OMA-ERELED-DRM-V1_0-20030801-C	01 Aug 2003	8	Fixed client requirements table OMA-MAG-DLDRM-2003-0128
OMA-ERELED-DRM-V1_0-20040601-C	01 June 2004	N/a	Update of enabler release before final approval. OMA-Download-DRMREL-v1_0: Corrected some inconsistencies in the SCR items. [OMA-BAC-DLDRM-2004-0014-CR_DRM_REL_v1-SCR-Items] OMA-Download-DRM-v1_0: Corrected some inconsistencies in the SCR items. [OMA-BAC-DLDRM-2004-0006R01-CR_DRMv1-SCR-Items]