Enabler Release Definition for DPE

Candidate Version 1.0 – 18 Aug 2009

Open Mobile Alliance

OMA-ERELD-DPE-V1_0-20090818-C

© 2009 Open Mobile Alliance Ltd. All Rights Reserved.

Used with the permission of the Open Mobile Alliance Ltd. under the terms as stated in this document. [OMA-Template-ERELD-20090101-I]

Contents

Figures

Tables

1. Scope

The scope of this document is limited to the Enabler Release Definition of DPE according to OMA Release process and the Enabler Release specification baseline listed in section 5.

2. References

2.1 Normative References

[DPE-AD]	"Device Profile Evolution Architecture", Version 1.0, Open Mobile Alliance™, OMA-AD-DPE-V1_0, URL:http://www.openmobilealliance.org/
[DPE_ETR]	"Enabler Test Requirements for DPE", Version 1.0, Open Mobile Alliance™, OMA-ETR-DPE-V1_0, URL:http://www.openmobilealliance.org/
[DPE-RD]	"Device Profile Requirements", Version 1.0, Open Mobile Alliance™, OMA-RD-DPE -V1_0, URL:http://www.openmobilealliance.org/
[DPE-TS]	"Device Profile Evolution Technical Specification", Version 1.0, Open Mobile Alliance™, OMA-TS-DPE-V1_0, URL:http://www.openmobilealliance.org/
[OMNA]	"OMA Naming Authority". Open Mobile Alliance™. http://www.openmobilealliance.org/tech/omna.aspx
[RFC2119]	"Key words for use in RFCs to Indicate Requirement Levels", S. Bradner, March 1997, URL:http://www.ietf.org/rfc/rfc2119.txt
[SCRRULES]	"SCR Rules and Procedures", Open Mobile Alliance™, OMA-ORG-SCR_Rules_and_Procedures, URL:http://www.openmobilealliance.org/

2.2 Informative References

[OMADICT]	"Dictionary for OMA Specifications", Version x.y, Open Mobile Alliance™, OMA-ORG-Dictionary-Vx_y, URL:http://www.openmobilealliance.org/

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", "Release Version Overview" and "Conformance Requirements Notation Details", are normative, unless they are explicitly indicated to be informative.

The formal notation convention used in sections 8 and 9 to formally express the structure and internal dependencies between specifications in the Enabler Release specification baseline is detailed in [SCRRULES].

3.2 Definitions

DPE Client	See [DPE-RD].
DPE Server	See [DPE-RD].
Service Provider	See [DPE-AD].
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

DPE	Device Profile Evolution
ERDEF	Enabler Requirement Definition
ERELD	Enabler Release Definition
OMA	Open Mobile Alliance
OMNA	Open Mobile Naming Authority

4. Release Version Overview

This document outlines the Enabler Release Definition for Device Profile Evolution (DPE) version 1.0 and the respective conformance requirements for clients and servers claiming compliance to it as defined by Open Mobile Alliance across the specification baseline.

The DPE enabler's primary goal is to provide a standardized solution for accessing the status of dynamic device properties. Coupled with the existing OMA User Agent Profile (UAProf) enabler that provides for access to static device capabilities, DPE will provide a more complete device context awareness solution, and thus support improved content/service adaptation.

[DPE-AD] defines the architectural context of the DPE enabler, which includes the enabler entities **DPE Server** and **DPE Client.** In illustration:
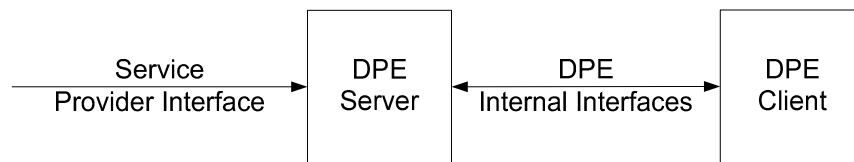
Figure 1: DPE Server and DPE Client

DPE's specifications address the interfaces and behaviors of the DPE Server and DPE Client. The specifications encompass the following overall functions:

1. Management of DPE sessions between DPE Client and DPE Server

2. Setting up automated property status reporting policies, as requested by Service Providers

3. Automated reporting on properties per the established policies

4. Handling Service Provider requests for on-demand property status reporting

DPE also defines a core vocabulary of dynamic device properties, that is intended to be extensible via the OMNA processes.

4.1   Version 1.0 Functionality

This release includes support for all DPE requirements defined in [DPE-RD]. The minimum functionality required for DPE Servers and DPE Clients includes:

1. Management of DPE sessions between DPE Client and DPE Server

2. Setting up automated property status reporting policies, as requested by Service Providers

3. Automated reporting on properties per the established policies

4. Handling Service Provider requests for on-demand property status reporting

5. Document Listing for DPE

This section is normative.

Doc Ref	Permanent Document Reference	Description
Requirement Document		
[DPE_RD]	OMA-RD-DPE-V1_0-20070209-C	Requirement Document for DPE Enabler
Architecture Document		
[DPE_AD]	OMA-AD-DPE-V1_0-20090818-C	Architecture Document for DPE Enabler
Technical Specifications		
[DPE_TS]	OMA-TS-DPE-V1_0-20090818-C	Specification that defines the interfaces and behaviors for the DPE Client and DPE Server.
[DPE_MO]	OMA-TS-DPE_MO-V1_0-20090818-C	Specification that defines the management object enabling configuration of DPE connection profiles via OMA Device Management.
Supporting Files		
[DPE_XSD]	OMA-SUP-XSD_DPE-V1_0-20090818-C	XML schema for the messages and included elements of the DPE interfaces. Working file in DTD directory: file: dpe-v1_0.xsd path: http://www.openmobilealliance.org/Tech/DTD
[DPE_MO_DDF]	OMA-SUP-MO_DPE-V1_0-20090818-C	DPE Device Management Object Description DTD Working file in DTD directory: file: oma_dpe_mo-v1_0.ddf path: http://www.openmobilealliance.org/tech/dtd/

Table 1: Listing of Documents in DPE Enabler

6. OMNA Considerations

DPE includes the following OMNA items:

1. OMA-based Uniform Resource Name (URN), used as the namespace identifier in the DPE schema

    a. "xmlns:dpe=urn:oma:xml:dpe:1.0"

2. Management Object

    a. MO Identifier: urn:oma:mo:oma-dpe:1.0

    b. Description: OMA DPE

    c. Owner: MCE WG

    d. Version: 1.0

    e. MO DDF: oma_dpe_mo-v1_0.ddf

    f. MO Spec: OMA-TS-DPE_MO-V1_0-20090107-D

3. PUSH Application Id

    a. Number: 0x14

    b. URN: x-oma-application:dpe.ua

    c. Description: OMA DPE

4. Content (MIME) Types and tokens

    a. MIME type of DPE XML messages

        i. application/vnd.oma.dpe

    b. MIME type of binary XML tokenized DPE XML messages

        i. application/vnd.oma.dpec

        ii. token:

5. DPE XML schema

    a. http://www.openmobilealliance.org/tech/profiles/dpe-v1_0.xsd

6. WBXML Document Public Identifier and token

    a. -//OMA//DPE 1.0//EN

    b. (to be assigned)

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 [SCRRULES].

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

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

8. ERDEF for DPE - Client Requirements

This section is normative.

Item	Feature / Application	Requirement
OMA-ERDEF-DPE-C-001-M	DPE Client	[DPE-TS]:MCF

Table 2: ERDEF for DPE Client-side Requirements

9. ERDEF for DPE - Server Requirements

This section is normative.

Item	Feature / Application	Requirement
OMA-ERDEF-DPE-S-001-M	DPE Server	[DPE-TS]:MSF

Table 3: ERDEF for DPE Server-side Requirements

Appendix A.   Change History   (Informative)

A.1   Approved Version History

Reference	Date	Description
n/a	n/a	No prior version –or- No previous version within OMA

A.2   Draft/Candidate Version 1.0 History

Document Identifier	Date	Sections	Description
Draft Versions OMA-ERELD-DPE-V1_0	17 Aug 2008	All	Initial draft

	28 Jan 2009	All	Editorial fixes:
			   2009 template
			   Removed editor's note in 3.2
			   Removed comment box in 6
			   Updated list of Documents in 5.

	23 June 2009	5, 6	Updated for agreed CR: OMA-DCAP-2009-0021-CR_ERELD_CONRR_Updates
	15 Jul 2009	5	Updated Document Listing
Candidate Version: OMA-ERELD-DPE-V1_0	18 Aug 2009	All	Status changed to Candidate by TP: OMA-TP-2009-0352-INP_DPE_V1_0_ERP_for_Candidate_Approval