
Project	IEEE 802.16 Broadband Wireless Access Working Group < http://ieee802.org/16 >	
Title	Update section 14 with Naming Convention Specification	
Date Submitted	2006-01-10	
Source(s)	Mary Chion	mchion@ztesandiego.com
	Jeff Qian	
	Cancan Huang	
	Sean Cai	
	ZTE San Diego Inc	
Re:	Contribution on comments to IEEE 802.16g-05/008r2	
Abstract	Include naming convention specification in section 14	
Purpose	Adoption	
Notice	This document has been prepared to assist IEEE 802.16. It is offered as a basis for discussion and is not binding on the contributing individual(s) or organization(s). The material in this document is subject to change in form and content after further study. The contributor(s) reserve(s) the right to add, amend or withdraw material contained herein.	
Release	The contributor grants a free, irrevocable license to the IEEE to incorporate text contained in this contribution, and any modifications thereof, in the creation of an IEEE Standards publication; to copyright in the IEEE's name any IEEE Standards publication even though it may include portions of this contribution; and at the IEEE's sole discretion to permit others to reproduce in whole or in part the resulting IEEE Standards publication. The contributor also acknowledges and accepts that this contribution may be made public by IEEE 802.16.	
Patent Policy and Procedures	<p>The contributor is familiar with the IEEE 802.16 Patent Policy and Procedures (Version 1.0) <http://ieee802.org/16/ipr/patents/policy.html>, including the statement "IEEE standards may include the known use of patent(s), including patent applications, if there is technical justification in the opinion of the standards-developing committee and provided the IEEE receives assurance from the patent holder that it will license applicants under reasonable terms and conditions for the purpose of implementing the standard."</p> <p>Early disclosure to the Working Group of patent information that might be relevant to the standard is essential to reduce the possibility for delays in the development process and increase the likelihood that the draft publication will be approved for publication. Please notify the Chair <mailto:r.b.marks@ieee.org> as early as possible, in written or electronic form, of any patents (granted or under application) that may cover technology that is under consideration by or has been approved by IEEE 802.16. The Chair will disclose this notification via the IEEE 802.16 web site <http://ieee802.org/16/ipr/patents/notices>.</p>	

Update section 14 with Naming Convention Specification

Mary Chion, Jeff Qian, Cancan Huang, Sean Cai

1. Introduction

Naming convention specification was introduced based on contribution C80216g-05_052r4 which was accepted in session #40. However, the text was not adopted in section 14.

2. Proposed Solution

Include a new section for naming convention in section 14.

3. Detail Text Changes

[Insert new section 14.2]

14.2 Service primitive template

14.2.1 Universal Naming Schema for SAP Service Primitive

The primitive name defined on the SAP consists of 3 fields – SAP, Function, and Operation:

SAP

- C – Control plane SAP
- M – Management plane SAP

Function

- CM – Configuration Management
- PM – Performance Management
- ALM – Alarm Management
- SM – Security Management
- HO – Hand Off
- PG – Paging
- SFM – Service Flow Management
- SMC – Secondary Management Connection
- RRM – Radio Resource Management

Operation

- REQ – Request
- RSP – Response to the REQ message

- ACK – Acknowledgement to the reception of REQ or RSP or NOTFY message
- NOTFY – Event Notification

These primitives are symmetrical between BS and NCMS. That is, both BS and NCMS can send these primitives to the other depending on the functional behavior defined for M-SAP and C-SAP. ACK shall only be supported in C-SAP.

14.2.2 SAP Service Primitive Object Format

There are two types of services: M-SAP/C-SAP operation service primitive and M-SAP/C-SAP notification service primitive.

- M-SAP/C-SAP operation service primitive:

This primitive is defined as Primitive_name () with a parameter list. The format shall be

```
primitive_name (   Message_id,
                  Operation_type,
                  Action_type,
                  Object_id,
                  Attribute_list,
                  Filter,
                  Scope,
                  Action_info,
                  Action_replay_info,
                  Time,
                  SAP_error_code )
```

The parameters shall be described briefly in the following table.

Parameter name	Mandatory /Optional	Definition
Msg_id	M	Integer uniquely identifies the primitive message
Operation_Type	M	Create, Delete, Get, Set, Action, Cancel
Action_type	O	When operation type is Action, it Specifies a particular action such as Start, End, Download, Reset, etc
Object_id	M	DN / RDN of managed objects which perform the operation
Attribute_list	M	Array of pair (Attribute_ID, Attribute_value). In Get request operation, Attribute_value is Null
Filter	O	Boolean expression involving attribute value to be evaluated for all selected objects.
Scope	O	Specify the sub-tree level of the naming tree for potentially objects to be selected.

Action_info	O	used in Action request about the action to perform
Action_replay_info	O	used in Action response about action replay
Time	O	Time info about an operation
SAP_error_code	O	used in error service to give the reason of the error

- M-SAP/C-SAP notification service primitive:

This primitive shall be defined as Primitive_name () with a parameter list. The format shall be

```
primitive_name (
    Message_id,
    Event_type,
    Event_info,
    Object_ID,
    Attribute_List,
    Time,
    SAP_Error_code)
```

The parameters are described briefly in the following table.

Parameter name	Mandatory /Optional	Definition
Msg_id	M	Integer uniquely identifies the primitive message
Event_Type	M	Specify the type of occurring event
Event_info	O	used in event request. Pass reported event info
Object_id	M	DN / RDN of managed objects which perform the operation
Attribute_list	M	Array of pair (Attribute_ID, Attribute_value).
Event_replay	O	used in event confirmation to pass event info
Time	O	Time info about an event
SAP_error_code	O	used in error service to give the reason of the error

14.2.3 SAP Service Primitive Flow Diagram Template

