Project	**IEEE 802.16 Broadband Wireless Access Working Group** <http://ieee802.org/16>
Title	**Frame Configuration Timer in H-FDD Operation**
Date Submitted	**2008-03-10**
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Re:	IEEE 802.16 Working Group Letter Ballot Recirc #26b
Abstract	Clarifications and signaling mechanisms are provided for efficient operation of H-FDD in 802.16e.
Purpose	Accept the proposed specification changes on IEEE P802.16Rev2/D3.
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Frame Configuration Timer in H-FDD Operation

1. Introduction

In H-FDD operation, the frame configuration information regarding the boundaries of the two DL partitions and two UL partitions can be changed dynamically. An indication by the BS on the expected behavior of boundary change can be useful for sleep mode operation of the MS.

In this contribution, we propose a mechanism that helps the sleep mode operation of MS when the frame configuration is changed dynamically.

2. Proposed Text

I: Modify Table 40 pg 86 Section 6.3.2.3.4 as shown

Syntax	Size (bit)	Notes
UL-MAP_Message_Format() {		
Management Message Type = 3	8	—
~~*Reserved*~~	~~8~~	~~Shall be set to zero~~
FDD Partition Change Flag	1	For FDD only. Indicates the next possible partition change 0: Possible partition change in next frame 1: Minimum number of frames (excluding current frame) before next possible change is given by TLV 'FDD Frame Change Partition Timer'
Reserved	7	Shall be set to zero
UCD Count	8	—

II: Modify Table 429 pg 831 Section 8.4.5.6.1 as shown

Syntax	Size (bit)	Notes
Compressed_DL_MAP() {		—
Compressed map indicator	3	Set to binary 110 to indicate a compressed map format
UL-MAP appended	1	—
~~*Reserved*~~	~~1~~	~~Shall be set to zero~~

FDD Partition Change Flag	1	For FDD only. Indicates the next possible partition change 0: Possible partition change in next frame 1: Minimum number of frames (excluding current frame) before next possible change is given by TLV 'FDD Frame Change Partition Timer'
Map message length	11	—

III: Add the row shown in Red to Table 543 Section 11.4.1 pg 1067

Name	Type	Length	Value(variable length)	PHY scope
Available DL Radio Resources	23	1	Indicates the average ratio of non-assigned DL radio resources to the total usable DL radio resources. The average ratio shall be calculated over a time interval defined by the DL_radio_resources_window_size parameter (Table 524). The reported average ratio will serve as a relative load indicator. This value can be biased by the operator provided it reflects a consistent representation of the average loading condition of BSs across the operator network. 0x00 : 0% 0x01 : 1% ... 0x64 : 100% 0x65 - 0xFE : reserved, 0xFF indicates no information available	All
FDD Frame Partition Change Timer (M)	26	1	Minimum number of frames before next possible partition change = 2^M frames	OFDMA