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Re:	A response to a Call for Technical Proposal, http://wirelessman.org/relay/docs/80216j-06_034.pdf	
Abstract	For a RS network entry, there may be a need for RS configuration procedure controlled by MMR-BS over the air. This contribution proposes a pair of MAC management messages for this purpose.	
Purpose	To incorporate the proposed text into the P802.16j Baseline Document (IEEE 802.16j-06/026r1)	
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RS Configuration Signaling

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Nortel

Introduction

For a RS network entry, there may be a need for RS configuration procedure controlled by MMR-BS over the air. This contribution proposes a pair of MAC management messages for this purpose.

Introduction of RS_Config-REQ/RSP management messages

We propose to introduce RS_Config-REQ/REP messages for the following reason

- When a RS is required to serve 802.16e MS, many physical layer parameters, such as 802.16e preamble, midamble, DL_PermBase, PRBS_ID and etc need to be configured. Those parameters can be pre-defined. However it may not be optimal to pre-define all the physical layer parameters, such as 802.16e preamble which may need a RS's assistance to be determined
- SBC-REQ/RSP may be used for this purpose, but it may be not a good way from security consideration
- REG-REQ/RSP may be employed for this purpose too, but these messages are not designed for purpose of configuration negotiation

By introducing this a pair messages, a secured, flexible and dynamic RS configuration can be implemented. This procedure shall happen during RS initial network entry and initialization and during normal operation.

Proposed text change

[Modify the last row in Table 14 in page 46 as follows]

Type	Message name	Message description	Connection
62-255-67	<u>RS_Config-REQ</u>	<u>RS configuration request message sent by RS</u>	<u>Basic</u>
<u>68</u>	<u>RS_Config-RSP</u>	<u>RS configuration response message sent by MMRBS</u>	<u>Basic</u>
<u>69-255</u>		<u>Reserved</u>	

[Add new sections 6.3.2.3.62 and 6.3.2.3.63 after section 6.3.2.3.61 in page 172]

6.3.2.3.63 RS configuration request message

This message is transmitted by a RS to request some physical layer operation parameters. A RS may use this message to report information to facilitate the determination of a MMRBS on configuration of RS operation parameters.

Table XXX. RS Config-REQ message format.

Syntax	Size	Notes
<u>RS Config-REQ format {</u>		
<u>Management message type = 67</u>	<u>8 bits</u>	
<u>Configured para type</u>	<u>8 bits</u>	<u>b0 = 1: preamble configuration is included;</u> <u>b1 – b7: reserved</u>
<u>If (b0 of Configured para type == 1) {</u>	<u>8 bits</u>	
<u>Preamble index }</u>	<u>7 bits</u>	<u>Preamble index</u>
<u>}</u>		

Configuration para type

The first bit is used as preamble index indicator to indicate the preamble index field appearance in this message

Preamble index

This field is used to indicate the preamble index selected by RS

6.3.2.3.63 MMR-BS configuration response message

This message is transmitted by a MMR-BS for the purpose of RS configuration. A MMR-BS can use this message to set operation parameters for a RS. MMR-BS can transmit this message as a response to RS Config-REQ or as a unsolicited message.

Syntax	Size	Notes
<u>RS Config-RSP format {</u>		
<u>Management message type = 68</u>	<u>8 bits</u>	
<u>Configured para type</u>	<u>8 bits</u>	<u>b0 = 1: preamble configuration is included;</u> <u>b1 – b7: reserved</u>
<u>If (b0 of Configured para type == 1) {</u>	<u>8 bits</u>	
<u>Preamble index }</u>	<u>7 bits</u>	<u>Preamble index</u>
<u>}</u>		

Configuration para type

The first bit is used as preamble index indicator to indicate the preamble index field appearance in this message

Preamble index

This field is used to indicate the preamble index assigned by MMRBS