IEEE P802.11
Wireless LANs

|  |
| --- |
| LB 203 Comment Resolution for 9.3.2.15 |
| Date: 2014-09-01 |
| Author(s): |
| Name | Affiliation | Address | Phone | email |
| Alfred Asterjadhi | Qualcomm Inc. | 5775 Morehouse Dr, San Diego, CA 92109 | +1-858-658-5302 | aasterja@qti.qualcomm.com |

Abstract

This submission proposes resolutions for comments in clause 9.3.2.15 of TGah Draft 2.0 with the following CIDs (TOT 4 CIDs):

* 3764, 3765, 3766, 3906

Revisions:

* Rev 0: Initial version of the document
* Changed “shall” to “may” for carrying the frame in a VHT Single MPDU (text highlighted in green)

Interpretation of a Motion to Adopt

A motion to approve this submission means that the editing instructions and any changed or added material are actioned in the TGah Draft. This introduction is not part of the adopted material.

***Editing instructions formatted like this are intended to be copied into the TGah Draft (i.e. they are instructions to the 802.11 editor on how to merge the text with the baseline documents).***

***TGah Editor: Editing instructions preceded by “TGah Editor” are instructions to the TGah editor to modify existing material in the TGah draft. As a result of adopting the changes, the TGah editor will execute the instructions rather than copy them to the TGah Draft.***

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **CID** | **P.L** | **Clause** | **Comment** | **Proposed Change** | **Resolution** |
| 3764 | 234.62 | 9.3.2.15 | "an NDP\_2M MAC frame if PREAMBLE\_TYPE is a >= 2 MHz short/long preamble"When the PREAMBLE\_TYPE is a >=2MHz short/long preamble, the responder may respond 1MHz NDP MAC frame. | Change the text correctly. | Revised –Agree in principle with the commenter. Proposed resolution clarifies the case of a STA that responds to a >=2MHz frame with a 1 MHz MAC frame. TGah editor to make the changes shown in 11-14/1116r1 under all headings that include CID 3764.  |
| 3765 | 236.40 | 9.3.2.15 | Per paragraph in L40, a S1G STA can't do MPDU in a PPDU, Medium a PPDU, ..., MPDUin a PPDU, BAR in a PPDU, BA since BA needs its eliciting frame in A-MPDU or VHT Single MPDU. Why only A-PMDU and single MPDU are allowed to elicit BA? | Clarify it. | Rejected –The comment fails to identify an issue. As a response to the commenter:VHT Single MPDUs and A-MPDUs are carried in PPDUs that have the AGREGGATION field in the SIG field set to 1. This signalling is used by third party STAs to correctly calculate the duration of the RID counter as described in 9.3.2.4a (RID update) where if this value is 1 the expected response is a 32 Octet MPDU (e.g., a BlockAck frame) while if the value is 0 then the response is a 14 Octet MPDU. Hence, the AGGREGATION field is used to correctly indicate to the intended receiver, and third party STA the type of control response and its length so that the deferral time is set correctly. For more information please refer to <https://mentor.ieee.org/802.11/dcn/13/11-13-0512-00-00ah-ack-indication-and-eifs.pptx>.  |
| 3766 | 236.48 | 9.3.2.15 | What happens when a STA wants to transmit a frame which is longer than the length limit that a MPDU allowed and is need to be acknowledged by Ack? | Clarify it. | Revised –Proposed resolution is to clarify that the intended receiver can still transmit an Ack if it supports A-MPDUs and in which case the control response frame can be transmitted as part of an A-MPDU that is padded to make a 32 byte long PSDU.TGah editor to make the changes shown in 11-14/1116r1 under all headings that include CID 3766. |
| 3906 | 234.48 | 9.3.2.15 | incomplete reference | add the word "table" in front of 9-4a | AcceptedNote to the editor: this is an inline editing instruction. |

**Discussion:** *None.*

* **Response Indication procedure**

***TGah Editor: Change the paragraph below as follows (#3764):***

An S1G STA transmitting a PPDU that expects an NDP Response shall calculate the Duration/ID field of the transmitted PPDU as described in 8.2.5.2 (Setting for single and multiple protection under enhanced distributed channel access (EDCA)) where the estimated duration of "CTS frame", "Ack frame", "BlockAck frame" is equal to NDPTxTime. NDPTxTime depends on the TXVECTOR parameter PREAMBLE\_TYPE and is equal to the time in microseconds, required to transmit:

* An NDP\_1M MAC frame if PREAMBLE\_TYPE is an S1G\_1M preamble or the intended receiver has indicated the use of 1 MHz control response frames (see 9.7.6.6 (Channel Width selection for Control frames))
* An NDP\_2M MAC frame if PREAMBLE\_TYPE is a >= 2 MHz short/long preamble and the intended receiver has not indicated the use of 1 MHz control response frames

***TGah Editor: Change the paragraph below as follows (#3766):***

An S1G STA transmitting an eliciting frame for which it expects a response that is an Ack frame as described in 9.29 (Link adaptation) or a STACK frame as described in 9.42 (Target wake time (TWT)) shall carry the eliciting frame in an MPDU (i.e., sets the TXVECTOR parameter AGGREGATION to 0) except when the intended receiver has set the A-MPDU Supported field in the most recently transmitted S1G Capabilities element to 1 in which case the S1G STA may carry the eliciting frame in a VHT Single MPDU

***TGah Editor: Change the paragraph below in 9.3.2.9 as follows (#3766):***

The S1G STA that satisfies any of the first three exceptions above shall transmit an Ack, TACK, or STACK frame instead of an NDP Ack frame as a response to an eliciting PPDU for which the RXVECTOR parameter RESPONSE\_INDICATION is equal to Normal Response.The control response frame shall be carried in a 32 Octet PSDU if the eliciting PPDU contains a VHT Single MPDU. An example of a 32 Octet PSDU is an Ack frame carried in an A-MPDU whose overall length is equal to 32 octets.