IEEE P802.11
Wireless LANs

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|  CR on 10.22.2.8 TXOP limits |
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Abstract

This submission proposes resolutions for multiple comments related to TGax D0.1 with the following CIDs:

* 6189, 7040, 9412

Revisions:

* Rev 0: Initial version of the document.

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

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

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| CID | Page.line | Comment | Proposed Change | Resolution |
| 6189 | 133.25 | The baseline spec does not allow a transmission that exceeds the TXOP limit for any fragmentable data. TXOP limit rules must be updated for HE STAs capable of dynamic fragmentation. | As per comment | Revised –Agree in principle with the comment as discussed in 11-17/0089r1TGax editor to make the changes shown in 11-17/0088r0 under the heading that include CID 6189. |
| 7040 | 132.53 | From the dynamic fragmentation capabilities in HE STA, 11ax needs to revise exception rules that allow a STA to exceed the TXOP limit. TXOP limit exception rules should be revised for HE STAs considering dynamic fragmentation capabilities. | As per comment. | Revised –Agree in principle with the comment as discussed in 11-17/0089r1TGax editor to make the changes shown in 11-17/0088r0 under the heading that include CID 7040. |
| 9412 | 133.25 | In the baseline, there are several exceptions that allows a STA to exceed the TXOP limit which can be avoided in HE BSS (regarding dynamic fragmentation). For better channel utilization of HE AP, the TXOP limit exception rules must be further clarified for HE STAs. | As per comment | Revised –Agree in principle with the comment as discussed in 11-17/0089r1TGax editor to make the changes shown in 11-17/0088r0 under the heading that include CID 9412. |

**Discussion: *This document includes the discussion provided in 11-170089r1***

**10.22.2.8 TXOP limits**

**TGax Editor: *Insert the following paragraphs below before the last paragraph of subclause 10.22.2.8*** *in page 133 of D1.0 (#CID 6189, 7040, 9412)*

The TXOP holder may exceed the TXOP limit only if it does not transmit more than one Data or Management frame in the TXOP, and only for:

* Retransmission of an MPDU, not in an A-MPDU consisting of more than one MPDU
* Initial transmission of an MSDU under a block ack agreement, where the MSDU is not in an A-MPDU consisting of more than one MPDU and the MSDU is not in an A-MSDU
* Transmission of a Control MPDU or a QoS Null MPDU, not in an A-MPDU consisting of more than one MPDU
* Initial transmission of a static fragment of an MSDU or MMPDU, if a previous fragment of that MSDU or MMPDU was retransmitted
* Transmission of a fragment of an MSDU or MMPDU fragmented into 16 fragments
* Transmission of an A-MPDU consisting of the initial transmission of a single MPDU not containing an MSDU and that is not an individually addressed Management frame
* Transmission of a group addressed MPDU, not in an A-MPDU consisting of more than one MPDU
* Transmission of a null data packet (NDP)
* Transmission of a VHT NDP Announcement frame and NDP or transmission of a Beamforming
* Report Poll frame, where these fit within the TXOP limit and it is only the response and the immediately preceding SIFS that cause the TXOP limit to be exceeded.
* Transmission of the first dynamic fragment of an MSDU or MMPDU, if the minimum fragment size specified by the receiver STA causes TXOP limit to be exceeded. The size of the fragment shall be set to the minimum fragment size.