IEEE P802.11
Wireless LANs

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| LB266 CR for CID 10437 |
| Date: 2023-01-10 |
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Abstract

This submission proposes resolutions for the following CIDs for TGbe LB266:

10437

Revisions:

* Rev 0: Initial version of the document
* Rev 1: Update the discussion part.

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 TGbe Draft. This introduction is not part of the adopted material.

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

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

***TGbe editor: The baseline for this document is 11be D2.3.***

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| **CID** | **Commenter** | **Clause** | **Pg/Ln** | **Comment** | **Proposed Change** | **Resolution** |
| 10437 | Liuming Lu | 35.9.5 Traffic delivery | 512. 44 | It has been specified that QoS Data frames of r-TWT TID(s) are first delivered during a restricted TWT SP. It is not enough for the dilvery of latency sensitive traffic as QoS Data frames of different r-TWT TIDs may have different latency requirements or different time to delay expire based on the delay bound, which means that the urgencies for the delivery of the different data frames are different. Therefore the rule or mechansm is needed to ensure that more urgent QoS Data frames of different r-TWT TIDs are firsly delivered during a restricted TWT SP. | The mechansm needs to be specified to ensure that more urgent QoS Data frames of different r-TWT TIDs are firsly delivered during a restricted TWT SP. | RevisedAgree to add a rule to ensure that more urgent QoS Data frames of r-TWT TIDs are firsly delivered during a restricted TWT SP.**Instruction to the editor**, ***please update the text in the subclause 35.8.5 Traffic delivery, as shown in this document (doc.: IEEE 802.11-22/2199r0).*** |

**Discussion:**

The urgencies for the delivery of the data frames belonging to r-TWT TID(s) during r-TWT SPs are not considered in current 11be draft, which would result that the data frames pending for urgent transmission can not be delivered timely. And The urgencies for the delivery of the data frames belonging to r-TWT TID(s) can be estimated based on whether their allowable transmission delay is expected to be expired or about to expire.

And the QoS Characteristics element has been specified to provide the characteristics and QoS expectations of a traffic flow. Based on the parameters carried in the QoS Characteristics element, such as Minimum Data Rate, Delay bound etc, the APs or STAs can estimate the rough urgencies for the delivery of of the data frames belonging the traffic.

This document proposes to add a general rule to ensure that more urgent QoS Data frames of r-TWT TIDs are firsly delivered during a restricted TWT SP.

**Proposed Text Change:**

 **editor**: ***please update the text in the subclause 35.8.5 Traffic delivery, as shown in the following (10437)***

**35.8.5 Traffic delivery**

An (#11109)R-TWT scheduling AP or a member R-TWT scheduled STA that has initiated or participated in a frame exchange during (#13012)an R-TWT SP shall ensure QoS Data frames of R-TWT TID(s), especially the QoS Data frames of R-TWT TID(s) whose allowable transmission delay (if available) is expected to be expired or about to expire, to be first delivered during the R-TWT SPs. In a trigger-enabled R-TWT SP, when scheduling the transmission of Trigger frames, the R-TWT scheduling AP shall first trigger member R-TWT scheduled STAs to facilitate them to first deliver their QoS Data frames of R-TWT UL TID(s), especially the QoS Data frames of R-TWT TID(s) whose allowable transmission delay (if available) is expected to be expired or about to expire, if any.

NOTE—The (#11109)R-TWT scheduling AP might still include the 12 LSB of the AID of a STA that is not a member of this R-TWT SP in Trigger frame(s) transmitted in trigger-enabled SPs.

**References:**

[1] 11-22/1037r1, LB266 CR for latency sensitive traffic delivery:

<https://mentor.ieee.org/802.11/dcn/22/11-22-1037-01-00be-lb266-cr-for-latency-sensitive-traffic-delivery.pptx>