IEEE P802.11
Wireless LANs

|  |
| --- |
| CR for CIDs in 35.7.2 Part III |
| Date: 2022-08-17 |
| Author(s): |
| Name | Affiliation | Address | Phone | email |
| Zinan Lin | InterDigital |  |  | zinan.lin@interdigital.com |
| Mahmoud Kamel | InterDigital |  |  |  |
| Xiaofei Wang | InterDigital |  |  |  |
|  |  |  |  |  |
|  |  |  |  |  |
|  |  |  |  |  |

Abstract

##### This submission present proposed resolutions for the following 2 CIDs: 11660, 12553

##### The proposed changes are based on 802.11be/D2.0.

##### Revision history:

##### r0 - initial version

##### r1- editorial change

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed Change** | **Resolution** |
| 12553 | 35.7.2 | 492.07 | "... the bandwidth of the EHT NDP Announcement frame ..." This expression is not correct, a MAC frame has no bandwidth. This sentence should refer to the PPDU carrying the EHT NDP Announcement frame as already stated in D2.0P139L64. | Change the sentence " ... the bandwidth of the EHT NDP Announcement frame ..." to " ... the bandwidth of the PPDU carrying the EHT NDP Announcement frame ..." | **Revised** |

**Discussion:**

The table below gives a summary of different terms related to “the bandwidth of the EHT NDP Announcement frame” in 802.11be D2.0:

|  |  |  |
| --- | --- | --- |
|  **Term** | **# of Occurrences in 802.11be D2.0** | **# of Occurrences Resolved in 11-22/1190r3** |
| bandwidth of the EHT NDP Announcement frame | 9 (6 in Subclause 9.3.1.19; 3 in Subclause 35.7.2) | 2 (CID 12554, 12555) in Subclause 35.7.2 |
| EHT NDP Announcement frame of bandwidth | 63 (2 in Subclause 9.4.1.71; 61 in Subclause 35.7.2) | 0 |

The table below shows a summary of the similar terms shown in REVme D1.3.

|  |  |
| --- | --- |
| **Term** | **# of Occurrences in 802.11 REVme D1.3** |
| bandwidth of the HE NDP Announcement frame | 11 |
| bandwidth of HE NDP Announcement frame | 1 |

There are two possible resolutions to correct the term of “bandwidth of the EHT NDP Announcement frame” and the term “EHT NDP Annoucement frame of bandwidth”:

1. Resolution 1: Perform global replacement as follows:

Replace “the bandwidth of the EHT NDP Announcement frame” with “the bandwidth of the PPDU carrying the EHT NDP Announcement frame”

Replace “an EHT NDP Announcement frame of bandwidth” with “an EHT NDP Announcement frame carried by a PPDU of bandwidth”

 2. Resolution 2: Add two NOTEs in the specs (since the terms are spread in difference subclauses, the place to put NOTE is TBD)

NOTE: “the bandwidth of the EHT NDP Announcement frame” represents “the bandwidth of the PPDU carrying the EHT NDP Announcement frame”. “an EHT NDP Announcement frame of bandwidth” represents “an EHT NDP Announcement frame carried by a PPDU of bandwidth”.

SP: Which resolution is preferred for CID 12553?

1. Resolution 1
2. Resolution 2
3. Abs

***TGbe editor: please make the following change in subclause 35.7.2***

P492L05

The bandwidth (partial or full) of the feedback solicited by an EHT beamformer from an EHT beamformee depends on the Partial BW Info subfield in the STA Info field identifying the EHT beamformee in the EHT NDP Announcement frame, (#12553) the bandwidth of the PPDU carrying the EHT NDP Announcement frame, and the operating bandwidth of the EHT beamformee.

TGbe editor: Please add the following NOTE on P495L7

(#12553) NOTE: “the bandwidth of the EHT NDP Announcement frame” represents “the bandwidth of the PPDU carrying the EHT NDP Announcement frame. “an EHT NDP Announcement frame of bandwidth” represents “an EHT NDP Announcement frame carried by a PPDU of bandwidth”.

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed Change** | **Resolution** |
| 11660 | 35.7.2 | 491.25 | Can an non-AP EHT STA become a SU beamformer? Is mandatory that an EHT AP is a SU Beamformer? If it is not, please indicate that a non-AP EHT STA shall not set the SU Beamformer subfield to 1. An EHT AP shall set the SU Beamformer subfield to 1. | As comment | **Revised**It is shown in the PICS that it is Optional to have SU beamformer capabilities if the supported maximum number of transmit spatial streams is less than 4; it is Mandatory to have SU beamformer capabilities if the supported maximum number of transmit spatial streams is greater than or equal to 4. Clarification has been added according to these descriptions.TGbe editor: please incorporate changes shown in 11-22/1324r1 under the tag 11660 |

***TGbe editor: please make the following change in subclause 35.7.2***

TGbe editor: Please add the following text in the end of the paragraph on P491L26

 (#11660) The setting of the SU Beamformer subfield in the EHT PHY Capabilities Information field in the EHT Capabilities element follows the setting given in Table 9-401l. If the maximum number of transmit spatial streams supported by the EHT STA is less than 4, the EHT STA may set the SU Beamformer subfield to 1 in the EHT PHY Capabilities Information field in the EHT Capabilities element it transmits. If the maximum number of transmit spatial streams supported by the EHT STA is equal to or greater than 4, the EHT STA sets the SU Beamformer subfield to 1 in the EHT PHY Capabilities Information field in the EHT Capabilities element it transmits.