IEEE P802.11
Wireless LANs

|  |
| --- |
| Resolutions for Editorial Comments in CC40 - Part 6 |
| Date: 2022-08-01 |
| Author(s): |
| Name | Affiliation | Address | Phone | email |
| Claudio da Silva | Meta Platforms, Inc |  |  | claudiodasilva@fb.com |
|  |  |  |  |  |

Abstract

This submission proposes resolutions to editorial comments submitted in CC40. The text used as reference is D0.2.

CIDs: 230, 28, 31, 403, 206, 721, 3, 4, 27, 720, 446, 722, 442, 29, 404, 406, 30, 32, 718, 719, 208, 724, 725, 726, 207, 405

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 230 | 11.21.20.1 | 76-81 | From Figure 11-41h to Figure 11-41n, the titles are the same: "DMG sensing instances". There isn't any difference that can differentiate those figures. | Add more descriptions to the title. For example, Figure 11-41h can be changed to "DMG sensing instances with delayed reporting". |
| 28 | 11.21.20.1 | 76 | make the caption of Figure 11-41h more specific | caption: DMG measurement instance with PCP/AP as Initiator and a single monostatic client as responder |
| 31 | 11.21.20.1 | 79 | more descriptive caption for Fig. 11-41k | new caption: DMG sensing procedure with PCP/AP as Initiator and three non-AP STA as sensing responders |

**Proposed resolution**: Revised

**Discussion**: The captions of Figures 11-41h through 11-41n have been modified per the resolution of comments 90 and 352 (Motion 114).

**Modifications**: Editor – Replace the captions of Figures 11-41h through 11-41n with the following:

Figure 11-41h—DMG sensing instances with delayed reports

Figure 11-41i—DMG sensing instances with aggregated report

Figure 11-41j—DMG sensing instances of the bistatic type

Figure 11-41k—DMG sensing procedure with three sensing responders

Figure 11-41l—DMG sensing instance with two monostatic sensing responders, sequential sounding

Figure 11-41m—DMG sensing instance with two monostatic sensing responders, parallel sounding

Figure 11-41n—DMG sensing instances of multistatic sensing with two sensing responders

Note to editor: This is the same as comment resolution for CIDs 90 and 352.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 403 | 11.21.20.1 | 74 | The term 'subset' is not precise | Change '... a subset of the WLAN sensing procedure' to '... a type of a WLAN sensing procedure' |

**Proposed resolution**: Revised

**Discussion**: The paragraph referred to by the commenter

was deleted as part of the resolution to CID 438 in 22/1095r1, which was approved by TGbf in motion 114.

**Modifications**: Editor – Delete lines P74L35-38.

Note to editor: This is the same as comment resolution for CID 438.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 206 | 11.21.20.1 | 74 | Reword the 8th paragraph to "The DMG sensing procedure applies to all DMG sensing type, unless otherwise specified for each type separately." | As in comment. |

**Proposed resolution**: Revised

**Discussion**: The paragraph referred to by the commenter

was deleted as part of the resolution to CID 437 in 22/1095r1, which was approved by TGbf in motion 114.

**Modifications**: Editor – Delete lines P74L32-34.

Note to editor: This is the same as comment resolution for CID 437.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 721 | 11.21.20.1 | 75 | DMG sensing session setupThe abbreviation Nmb appears to be non standard. I did a search and could not find this. "No" seems adequate, but also writing "number" seems fine. | The abbreviation is used in 100 places or so. If the group accept, the editor can just do seach and replace. I see no need to spend 2 hours to identify each position, especially if the group disagrees. |

**Proposed resolution**: Rejected

**Discussion**: While earlier versions of TGbf’s draft (and of TGbf’s SFD) used “Nmb” as short for “number”, the abbreviation does not appear in either D0.1 nor D0.2.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 3 | 11.21.20.5.5b | 88 | Improper English sentence. "SIFS after receiving the response from the last sensing responder, the sensing initiator shall transmit EDMG Multistatic Sensing PPDUs." | Delete SIFS. "After receiving the response from the last sensing responder, the sensing initiator shall transmit EDMGMultistatic Sensing PPDUs." |
| 4 | 11.21.20.5.5c | 88 | Improper English sentence. "SIFS after the transmission of the last PPDU, the sensing initiator sends a DMG Sensing Poll frame to eachof the sensing responders." | Delete SIFS. "After the transmission of the last PPDU, the sensing initiator sends a DMG Sensing Poll frame to each of the sensing responders." |

**Proposed resolution**: Revised

**Discussion**: Deleting SIFS is not possible as it is necessary to define the timing requirement for the transmission of the EDMG Multistatic Sensing PPDUs and DMG Sensing Poll.

Reference text for CID 3:

Reference text for CID 4:

Note: From the baseline “If the intended receiver is a non-HE STA, a STA shall not start the transmission of more than one MPDU within the time limit described in the Minimum MPDU Start Spacing field declared by the intended receiver.”

**Modifications**: Editor – Change the following pages/lines as indicated:

* P104, l. 12-13 (D0.2): Replace

“SIFS after receiving the response from the last sensing responder, the sensing initiator shall transmit EDMG Multistatic Sensing PPDUs.”

with

“The sensing initiator shall start the transmission of EDMG Multistatic Sensing PPDUs a SIFS after receiving the response from the last sensing responder.”

“The sensing initiator shall transmit EDMG Multistatic Sensing PPDUs a SIFS after receiving the response from the last sensing responder.”

* P104, l. 31-32 (D0.2): Replace

“SIFS after the transmission of the last PPDU, the sensing initiator sends a DMG Sensing Poll frame to each of the sensing responders.”

with

“The sensing initiator sends a DMG Sensing Poll frame to each of the sensing reponders a SIFS after the transmission of the last PPDU.”

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 27 | 11.21.20.1 | 74 | It is better to use the term "DMG measurement instance" instead of "DMG sensing instance", to be consistent with sub 7 Ghz terminology. If we agree, this will be a global change in the document for DMG sensing. | Change "DMG sensing instance" to "DMG Measurement instance" |

**Proposed resolution**: Revised

**Discussion**:

* The term “DMG sensing instance” is used broadly (133 occurences) and consistently in 11.21.20 and in DMG-related sub-clauses in Clause 9. The term “DMG measurement instance” only appears 10 times in D0.2, and it could be substituted by “DMG sensing instance”.
* To align with sub-7 GHz terminology, we would have to use “DMG sensing measurement instance”. The importance of aligning sub-7 GHz and 60 GHz terminology can be argued.
* Suggest to continue to use “DMG sensing instance”.

**Modifications**: Editor – Replace “DMG measurement instance” with “DMG sensing instance” in the draft.

Also, change page 94, lines 61-65 (D0.2) as indicated:

The Sensing Instance SN(#397, #223) uniquely identifies the DMG sensing instance per the Measurement Burst ID(#424, #426). There are 3 DMG ~~Measurement Instances~~ sensing instances in each burst, ~~numbered DMG Measurement Instance number equal to 1, DMG Measurement Instance number equal to 2, and DMG Measurement Instance number equal to 3, respectively.~~ which have Sensing Instance SNs equal to 1, 2, and 3, respectively.

Also, change page 92, lines 6-7 (D0.2) as indicated:

There are 3 DMG sensing instances in each burst, ~~numbered Sensing Instance SN(#397, #223) equal to 1, Sensing Instance SN(#397, #223) equal to 2, and Sensing Instance SN(#397, #223) equal to 3, respectively.~~ which have Sensing Instance SNs (#397, #223) equal to 1, 2, and 3, respectively.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 720 | 11.21.20.1 | 75 | sounds strange to say that "instances are performed" | replace by "sening is performed" |

**Proposed resolution**: Rejected

**Discussion**: Text referred to by the commenter is

The change proposed by the commenter is not valid because the concepts of “operational attributes” and “DMG measurement Setup ID” are associated with DMG sensing instances, and not “sensing”. It is also worth noting that “instances are performed” can also be found in 11.21.18. It is not clear whether substituting the word “performed” with “executed” or “accomplished” would improve readability.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 446 | 11.21.20.1 | 77 | The example starts in the DMG sensing instance number equal to 1. - language inaccurate. | replace with "The example sarts with a DMG Sensing instance with the DMG Sensing Instance equal to 1" same with with similar instances in this paragraph |

**Proposed resolution**: Revised

**Modifications**: Editor – Change the paragraph in 94.1-12 as follows:

The example starts with a DMG sensing instance that has ~~in the~~ Sensing Instance SN(#397, #223) equal to 1. In the sounding phase, the PCP/AP transmits the BRP frame, and the sensing responder STA receives the frame. The sensing responder STA performs the sensing measurements on the TRN fields. In the example, the sensing responder STA is not ready to report the results of the immediately preceding sensing phase. So, it indicates the result as invalid in the reporting frame. In the DMG sensing instance with Sensing Instance SN(#397, #223) equal to 2, the responding STA performs the sensing measurement in the sounding phase. At the reporting phase, the responding STA is ready with the results of the sounding performed at the previous DMG sensing instance with Sensing Instance SN(#397, #223) equal to 1. It delivers the report indicated as ~~belonging~~ corresponding to ~~the~~ Sensing Instance SN(#397, #223) equal to 1 in the BRP frame. In the DMG sensing instance with Sensing Instance SN(#397, #223) equal to 3, the responding STA performs the sounding and delivers the report ~~of the~~ corresponding to Sensing Instance SN(#397, #223) equal to 2 sounding to the PCP/AP.

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 722 | 11.21.20.1 | 79 | replcae "not-sesning capable" by "sensing non-capable" | As in comment. |
| 442 | 11.21.20.1 | 76 | "The DMG sensing procedure is initiated by the PCP/AP that is not capable of DMG sensing" - if it is not capable, how does it participate in the procedure. | repalce with "by a PCP/AP that is not capable of being DMG sensing trasmitter or receiver" |

**Proposed resolution**: Revised

**Discussion**: The statement found in D0.1 that “The sensing initiator of a coordinated monostatic DMG sensing measurement may be a STA not capable of monostatic DMG sensing.” was removed in D0.1 as part of the resolution of CIDs 869, 450, and 451 (22/0966r1). As pointed out by the commenter of CID 442, the intent was to define that a PCP/AP that initiates a coordinated monostatic procedure may not be capable of the roles of sensing transmitter and sensing receiver.

**Modifications**: Editor – Change the following pages/lines as indicated:

* Page 92, lines 13-14 (D0.2): “~~The DMG sensing procedure is initiated by the PCP/AP that is not capable of DMG sensing.~~”
* Page 92, lines 55-56 (D0.2): “~~The DMG sensing procedure is initiated by the PCP/AP that is not capable of DMG sensing.~~”
* Page 95, lines 62-65 (D0.2): “The example illustrates(#723) the coordinated monostatic sensing type with ~~the not-sensing capable initiator and~~ two sensing responders STA A and STA B.”

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Comment** | **Proposed change** | **Resolution** |
| 29 | 11.21.20.1 | typo in the Fig. 11-41j | Burst ID should be 1 in the middle burst. | Accepted |
| 404 | 11.21.20.1 | In Figure 11-41j, the Burst ID for the second instance should be equal to 1 not 2 | Change the Burst ID for the second burst instance to 2 | Revised |

**Discussion**: The “proposed change” in CID 404 has a typo: As indicated in the corresponding “comment”, the Burst ID should be equal to 1. For reference, the figure referred to is:

**Modifications**: Editor – Replace Fig. 11-41j with the one below



|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 406 | 11.21.20.1 | 78 | The symbols T1, T2, T3, and T4 are referred to in the text but not shown on Figure 11-41k | Show T1, T2, T3, and T4 on Figure 11-41k |
| 30 | 11.21.20.1 | 78 | T1, T2, T3 and T4 not shown in Fig. 11-41k | show T1, T2, T3 and T4 in Fig. 11-41k. |
| 32 | 11.21.20.1 | 79 | Missing "intra busrst interval" and "inter burst interval" in the figure | Just to be complete, should indicate "intra busrst interval" and "inter burst interval" on the right side of the figure (with MS ID=1) |

**Proposed resolution**: Revised

**Modifications**: Editor – Replace Fig. 11-41k with the one below



|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 718 | 11.21.20.1 | 74.24 | Change "of" to "by" | As in comment. |

**Proposed resolution**: Accepted

**Discussion**: Text referred to by the commenter:



|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 719 | 11.21.20.1 | 74.37 | add "the" before "DMG" | As in comment. |

**Proposed resolution**: Accepted

**Discussion**: Text referred to by the commenter:



|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 208 | 11.21.20.1 | 75 | Change "when" to "where" | As in comment. |

**Proposed resolution**: Accepted

**Discussion**: Text referred to by the commenter:



|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 724 | 11.21.20.1 | 81 | Replace "report" by "reporting" | As in comment. |

**Proposed resolution**: Accepted

**Discussion**: Text referred to by the commenter:



|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 725 | 11.21.20.1 | 81 | Remove "in the sensing transmitter role" | As in comment. The rolse have been clarified just above, no need to repeat |
| 726 | 11.21.20.1 | 81 | Remove "in the sensing receiver role" | As in comment. The rolse have been clarified just above, no need to repeat |

**Proposed resolution**: Accepted

**Discussion**: Text referred to by the commenter:



|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 207 | 11.21.20.1 | 74 | Reword "A sensing initiator may maintain multiple sensing responders in multiple DMG sensing bursts and DMG sensing instances associated with different DMG measurement setups." to "A sensing initiator may initiate multiple DMG sensing bursts and DMG sensing instances associated with differnt DMG measurement setups with multiple sensing responders." | As in comment.  |

**Proposed resolution**: Accepted

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **CID** | **Clause** | **Page** | **Comment** | **Proposed change** |
| 405 | 11.21.20.1 | 78 | The DMG Measurement Setup ID is equal to 2 not 1 | Change 'DMG Measurement Setup ID equal to 1' to 'DMG Measurement Setup ID equal to 2' |

**Proposed resolution**: Accepted

**Discussion**: Text referred to by the commenter:

