IEEE P802.11  
Wireless LANs

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| LB272 comments SBP comments resolution | | | | |
| Date: 2023.06.xx | | | | |
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Abstract

This submission contains the proposed comment resolutions for the CIDs 2072.

R0: initial document

# CID 2072

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| CID | Page.  Line | Clause Number | Comment | Proposed Change | Resolution |
| 2072 | 117.05 | 9.4.2.321 | When status code within the SBP response frame equals to REJECTED\_WITH\_SUGGESTED\_CHANGES or when SBP Parameters element is included in the SBP Termination frame, the value of Number of Sensing Responders subfield indicates the suggested number of sensing responders. Since the SBP responder already suggests the Number of Sensing Responders, it is better to also includes the addresses of these 'suggested responders' in the SBP response frame for SBP initiator's consideration. | As noted. | Revised.  Agree with the commenter in principle.  TGbf Editor make changes specified in 0867r0.  <https://mentor.ieee.org/802.11/dcn/23/11-23-0867-00-00bf-lb272-comments-sbp-comments-resolution.docx> |

Discussion 1

In currernt SBP procedure, SBP initiator could include its preferred sensing responder(s) in the SBP request frame for SBP responder (AP) to setup the sensing measurement session. If SBP procedure is not success, SBP responder may also include suggested sensing respoders’ MAC addresses in SBP response frame. With the information of suggested preferred responders’ MAC addresses, SBP intiator could adjust its preferred responder list when it transmit the SBP request frame next time.

An example is shown here.

SBP initiator include STA A, STA B and STA C in the SBP request frame as its preferred responders. SBP responder cannot setup the SBP procedure due to some reasons (e.g. in appropriate parameters, can not reach the required number of sensing responders).

SBP responder could include the MAC addresses of STA A and STA B in the SBP response frame when Status Code equals to REJECTED\_WITH\_SUGGESTED\_CHAGNES.

Based on the information, SBP initator understands that STA A and STA B could be selected as sensing responder. To enhance the success probability, SBP initiator may include another responder (e.g. STA D) as its preferred sensing responder in next SBP request frame.

Discussion end

Discussion 2

In currernt SBP procedure, the Preferred Responder List field within the SBPParameters parameter of an MLME-SBP.response primitive shall be set to 1 only if:

— The StatusCode parameter within the MLME-SBP.response primitive is set to SUCCESS; and

* The Preferred Responder List field within the SBPParameters parameter of the corresponding MLME-SBP.indication primitive is equal to 1.

Once the Preferred Responder List field is set to 1, both SensingResponderAddresses and SensingResponderIDs parameters shall be included in the MLME-SBP.response primitive. In this case, the Number of Preferred Responders field shall be equal to the number of MAC addresses within the SensingResponderAddresses parameter and the number of AID/USIDs within the SensingResponderIDs parameter.

To avoid privacy problem, SBP responder shall not transmit sensing responders’ MAC addresses which is not included in the Sensing Responder Addresses field within SBP request frame to SBP initiator. In other words, the MAC addresses included in the Sensing Responder Addresses field within SBP response frame shall be a subset of the MAC addresses included in the SBP request frame. This can be summaried into to cases as follows.

Case 1: The Mandatory Preferred Responder field in SBP request frame is set to 1.

In this case, if the Status Code in MLME-SBP.response primitive equals to SUCCESS, the MAC addresses included in the Sensing Responder Addresses field within SensingResponderAddresses parameter are same with the MAC addresses included in the SensingResponderAddresses parameter within MLME-SBP.request primitive. In this case, the Number of Preferred Responders field shall be equal to the number of MAC addresses within the SensingResponderAddresses parameter and the number of AID/USIDs within the SensingResponderIDs parameter.

Case 2: The Mandatory Preferred Responder field in SBP request frame is set to 0.

In this case, if the Status Code in MLME-SBP.response primitive equals to SUCCESS, the MAC addresses included in the Sensing Responder Addresses field within SensingResponderAddresses parameter is a subset of the MAC addresses included in the SensingResponderAddresses parameter within MLME-SBP.request primitive. In this case, the Number of Preferred Responders field shall be equal to the number of MAC addresses within the SensingResponderAddresses parameter and the number of AID/USIDs within the SensingResponderIDs parameter.

For case 2, when Status Code in MLME-SBP.primitive euqals to SUCCESS, relevant parameters could be set in 2 ways.

1. Number of Preferred Responders field = the number of Mac Addresses (which is a subset of the MAC addresses included in corresponding SBP request frame) = the number of IDs

SBP responder only includes the IDs of the sensing responders present in the Sensing Responder Addresses field, i.e. SBP responder only share part the sensing responders’ ID to SBP initiator.

1. Number of Preferred Responder filed = the numner of Mac Addresses < the number of IDs = Number of Sensing Responders field.

SBP responder includes the IDs of the all sensing responders (some of them may not present in the Sensing Responder Addressed field) used to satisfy the corresponding SBP request, i.e. SBP responder share all the sensing responders’ ID to SBP intiator.

Prefer the 2nd way: SBP intiator could know all the IDs of the sensing responders by receving the SBP response frame (Status Code equals to SUCCESS) during the SBP setup exchange. SBP initiator may futher indentify if these sensing responder are good for the sensing application by some methods (e.g. check the IDs in cloud). If not, SBP initiator could terminate the SBP procedure at the very beginning to save time/power/…

Discussion end

***Instructions to the editor: please make the following changes to paragraphs from P155L11 to P155L40 in the subclause 11.55.2.2 Setup exchange in D1.1 as shown below:***

The Preferred Responder List field within the SBPParameters parameter of an MLME-SBP.response primitive shall be set to 1 if:

— The StatusCode parameter within the MLME-SBP.response primitive is set to SUCCESS; and

* The Preferred Responder List field within the SBPParameters parameter of the corresponding MLME-SBP.indication primitive is equal to 1.

Otherwise, the Preferred Responder List field within the SBPParameters parameter of an MLMESBP.response primitive shall be set to 0.

If the Preferred Responder List field within the SBPParameters parameter of the MLME-SBP.response primitive is set to 0, neither the SensingResponderAddresses nor the SensingResponderIDs parameters shall be included in the primitive. If the Preferred Responder List field within the SBPParameters parameter of the MLME-SBP.response primitive is set to 1, both SensingResponderAddresses and SensingResponderIDs parameters shall be included in the primitive. If the Mandatory Preferred Responder field within the SBPParameters parameter of the corresponding MLME-SBP.indication primitive is equal to 1, the MAC addresses within the SensingResponderAddresses parameter of an MLME-SBP.response primitive shall be same with the MAC addresses within the SensingResponderAddresses parameter of corresponding MLME-SBP.indication primitive. In this case, the Number of Preferred Responders field shall be equal to the number of MAC addresses within the SensingResponderAddresses paratmeter and the number of AID/USIDs within the SensingResponderIDs parameter of the MLME-SBP.response primitive. If the Mandatory Preferred Responder field within the SBPParameters parameter of the corresponding MLME-SBP.indication primitive is equal to 0, the MAC addresses within the SensingResponderAddresses parameter of an MLME-SBP.response primitive shall be a subset of the MAC addresses within the SensingResponderAddresses parameter of corresponding MLME-SBP.indication primitive. In this case, the Number of Preferred Responders field shall be equal to the number of MAC addresses within the SensingResponderAddresses paratmeter the MLME-SBP.response primitive.

If the StatusCode parameter within the MLME-SBP.response primitive is set to SUCCESS, the Number of Sensing Responders field within the SBPParameters parameter shall be equal to the number of sensing responders used in the sensing procedure used by the SBP responder to satisfy the SBP request. If the Mandatory Preferred Responder field within the SBPParameters parameter of the corresponding MLME-SBP.indication primitive is equal to 1, the Number of Sensing Responders field within the SBPParameters parameter of an MLME-SBP.response primitive shall be equal to the number of MAC addresses within the SensingResponderAddresses paratmeter and the number of AID/USIDs within the SensingResponderIDs parameter the MLME-SBP.response primitive. If the Mandatory Preferred Responder field within the SBPParameters parameter of the corresponding MLME-SBP.indication primitive is equal to 0, the Number of Sensing Responders field within the SBPParameters parameter of an MLME-SBP.response primitive shall be equal to the number of AID/USIDs within the SensingResponderIDs parameter the MLME-SBP.response primitive.

If the StatusCode parameter within the MLME-SBP.response primitive is set to REJECTED\_WITH\_SUGGESTED\_

CHANGES, the Number of Sensing Responders field within the SBPParameters parameter should indicate a suggested number of sensing responders. In this case, the Preferred Responder List field may set to 1 and SensingResponderAddresses parameter may be included in the MLME-SBP.response primitive. When present, the MAC addresses within the SensingResponderAddresses parameter of an MLME-SBP.response primitive shall be a subset of the MAC addresses within the SensingResponderAddresses parameter of corresponding MLME-SBP.indication primitive.

***Instructions to the editor: please make the following changes to paragraphs from P157L11 to P157L40 in the subclause 11.55.2.2 Setup exchange in D1.1 as shown below:***

If the SBP responder of an SBP request that has resulted in an MLME-SBP.response primitive being issued with StatusCode parameter set to SUCCESS is not able to satisfy required parameters specified in the corresponding MLME-SBP.indication primitive after the MLME-SBP.response primitive was issued, it shall issue an MLME-SBPTERMINATION.request primitive with PeerSTAAddress parameter equal to the SBP initiator’s MAC address. The MeasurementSessionID parameter within the MLME-SBPTERMINATION.request primitive issued by the SBP responder shall be identical to the MeasurementSessionID within the corresponding MLME-SBP.response primitive. When SBPParameters parameter is included in an MLME-SBPTERMINATION.request primitive, the Preferred Responder List field may set to 1 and SensingResponderAddresses parameter may be included in the same primitive. When present, the MAC addresses within the SensingResponderAddresses parameter of an MLME-SBPTERMINATION.request primitive shall be a subset of the MAC addresses within the SensingResponderAddresses parameter of corresponding MLME-SBP.indication primitive.

# SP

Do you support resolutions to the following CIDs and incorporate the text changes into the latest TGbf draft: 2072 in 11-23/0867r0?

Y/N/A