IEEE P802.11  
Wireless LANs

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| TGbi Minutes Mixed Mode January Interim Sessions 2025  12-17 January 2025 | | | | |
| Date: 2025-02-21 | | | | |
| Author(s): | | | | |
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Abstract

This document contains the minutes for the IEEE 802.11bi task group meetings that took place during the IEEE 802.11 Mixed Mode January interim session 12-17 January 2025. The on-site location for the meeting was Kobe (Japan).

Note: Highlighted text are action items.

Q – proceeds a question

A - proceeds an answer

C - proceeds a comment

Yellow highlight - action point

**Revision:**

R0: initial revision

**1rst slot: Monday January 13th 2024, 13:30 local time.**

**Chair: Carol Ansley, Cox Communications**

**Secretary: Stéphane Baron**

**Vice-chairs: Jerome Henry, Cisco; Antonio DeLaOlivaDelgado, InterDigital, Inc**

**Technical editor: Po-Kai Huang, Intel**

Chair calls meeting to order at 13:31 Local time.

Agenda slide deck: [11-24-2117r2](https://mentor.ieee.org/802.11/dcn/24/11-24-2117-02-00bi-tgbi-january-interim-agenda.pptx):

1. Reminder to do attendance

Reminder to register for the session and to not attend the virtual meeting without paying appropriate meeting fees.

1. The chair mentioned the call for essential patents
   1. No one responded to the call for essential patents
2. Review of policies and procedures.
   1. IEEE individual process slides were presented.

No questions

1. The chair covered the IEEE copyright policy and participation rules.

No questions

1. Quick review of the hybrid meeting protocols

1. **Discussion of agenda 11-24-2117r2 (slide #16)**
   1. Discussion on agenda

1999r0 moved to tomorrow upon author request

Author asked for a timeslot for a presentation 25/0155r0

Author of documents scheduled for today indicates corresponding numbers: 135r0 ,136r0, 137r0

Author of document scheduled for Tuesday PM2 indicate the document’s number: 25/153r0

Phil request timeslot for tomorrow.

* 1. Adoption of agenda by unanimous consent (21 participants online, 24 in the room).

1. **Administrative**

Approval of the previous minutes.

**Motion #53 text:**

Approve the prior session minutes and teleconference minutes:

11-24/1911r0 (November Plenary minutes), 11-14/2052r0 (December and January teleconference minutes)

**Motion #53: moved by Jerome Henry and seconded by Peter Yee**

**Discussion on motion #53:** No discussion

**Motion #53 approved by unanimous consent (28 attendees online and 26 in the room)**

1. **Technical Submissions**
   1. [11-25/0136r0](https://mentor.ieee.org/802.11/dcn/25/11-25-0136-00-00bi-bpe-ap-discovery-presentation.pptx) -- BPE AP Discovery -- Jarkko Knecht

Document presented by Jarkko. The Document proposes some enhancements to the BPE discovery. Companion document: 11-25/0153r0 provides normative text associated to the current document.

First proposal is to add a STA-ID in the PASN1 mechanism

Second improvement is to add a request for AP parameters in the PASN1

* + 1. Discussion

Q: On Slide 9: You are referring a mechanism we do not currently have (ack).

A: We have a MAC level Ack not the PASN frame.

Q: So, you are relying on the MAC ack to determine the exchange is correct?

A: yes.

C: Please update document reference to 11-25, instead of 11-24.

C: Slide 8: Key point here is that the frames 2 and 4 can be merged but in Slide 10 you purely removed those frames and the AP then do not receive any feedback from the STA and I cannot support such design.

A: We have the STA-ID. Based on that the AP can identify the station.

C: PASN1 is not protected, so a rogue station can just copy past the params and cerate its own PASN1 frame. So, this is not secured.

C: From implementation point of view, I would like to avoid change PASN implementation.

Q: You want to reduce frame exchange, this is good. Can we use this mechanism without changing the PASN mechanism?

A: Those enhancements can be used separately.

C: A new requirement is that AP needs to keep track of MAC addresses of the stations.

C: A man in the middle can duplicate the PASN1 frame so this handshake is broken.

A: You means that the calculation of the STAID need the key also?

C: regarding the STA-ID generation, a parameter is missing in the HMAC-SHA-256.

Q: Why not reusing the IRMA mechanism rather than creating a new STA-ID definition?

A: In fact, you need the RSNE to authenticate and the IRMA will not be sufficient.

To allow more offline discussion, presenter skip presentation of document 11-25/0135r0 that is linked to the current presentation and start presenting 11-25/0137r0.

* 1. [11-25/0137r0](https://mentor.ieee.org/802.11/dcn/25/11-25-0137-00-00bi-capability-of-robust-beamforming.docx): Capability of Robust Beamforming – Jarkko Knecht

Document presented by Jarkko.

Propose to split the robust beamforming capability into 2 capabilities fr TB and non-TB Robust beamforming.

* + 1. Discussion

C: Most of the 11bi is optional so I have no problem for people to add capability so I support it.

Since this is first presentation, author do not request SP and ask for feedback offline.

* 1. [11-25/0155r0](https://mentor.ieee.org/802.11/dcn/25/11-25-0155-00-00bi-sae-password-identifier-update.docx): SAE Password identifier protection – Jouni Malinen

Document presented by Jouni.

Proposes a new way to protect the SAE password identifier considering the lack of support received on previous proposal.

* + 1. Discussion

Q: How do you ambition trust 0. Do you renew the SAE each time?

A: yes.

Q: I believe the STA provides it to the AP in the very first frame of the negotiation?

A: Right.

C: At that time, the STA do not know if the AP is correct or not.

A: I am fine with solving this problem, but this is not a requirement for 11bi.

C: I agree this is not in the requirement, but Password identifier can be used to track a station.

A: If this is your concern, I recommend reading some of our presentations rejected previously.

A: The current solution is simple and working. If you have additional solution, we can study it for next round.

C: Some previous complains on previous solution were not technical issues. I think people complaining against previous solution should bring up a better solution.

Q: This is a very different approach from the previous solution, right?

A: yes.

Q: This solution is like a black box for the station, right?

A: right.

Q: You are not worry on leakage that can occur upon failure? This is a partial solution.

A: The only open Item is an environment where the STA cannot connect the AP.

C: Previous document 39 was changing the values even upon failure.

C: I discovered the proposal 20 minutes ago, so even if it seems ok, I would like more time to think of it.

Q: On the next identification, does the STA use the same identifier?

A: If you are manually configuring it, user will never be exposed.

C: Chair: Since this is a new item, I recommend deferring the SP to tomorrow for instance.

Q: Can we put a date for this SP?

A: Chair: Tentative is PM2 on Tuesday.

Q: General question: Do you say we have to address every comment and every requirement?

A: Chair: we do not have to address every comment for this round. For the requirements, I would prefer to cover as much as possible.

* 1. [11-25/0153r0](https://mentor.ieee.org/802.11/dcn/25/11-25-0153-00-00bi-comment-resolution-cids-1112-1118-1176.docx): Comment resolution CIDs 1112, 1118, 1176 – Antonio de la Oliva

Document presented by Antonio.

Document contains resolution for 3 CIDs that are already solved in another document.

* + 1. Discussion

C: I prefer that each comment is standalone, so please indicate to integrate the change described in another document.

A: OK.

Q: There is no text change associated right?

A: Yes, this is just cleaning.

Author prepared r1 and will ask for a SP later on.

After discussion, it is decided to skip the SP since no change in the draft is needed and resolution will be added directly to the motion asking creating Draft 1.0

* 1. [11-25/0156r0](https://mentor.ieee.org/802.11/dcn/25/11-25-0156-00-00bi-proposed-edp-mib-changes.docx): Proposed EDP MIB Changes – Carol Ansley

Carol presented the document.

Document contains proposed spec texts for EDP Group Epoch Feature Activation

MIB already exist to indicate group epoch operation is enabled.

This submission proposes to move the station level MIBs and to an MLD level ones.

* + 1. Discussion

Q: Clarification question: You remove the description in previous places?

A: Yes, there is instruction to editor accordingly.

Q: Why do we need EHT there?

A: In 11be, the MLD parameters are put in the EHT table, so I followed similar way.

C: My point is that this is linked to EHT and in the future people may want of implement 11be not bi.

A: I see your concern.

A: This concern was tried to be addressed, but was not and we now have difficulties. Setting up a section may be beneficial.

A: There are also other MIB that could be applied to any STA, so I didn’t ask to move them.

C: I don’t like the idea to hide those elements in the EHT stuff.

Author will have a look again in the MIB to find a more generic place or create a dedicated table for bi.

1. **AoB**

No other business

Next TGbi session is tomorrow AM1.

1. Chair Recess at 15:19

**2nd slot: Tuesday January 13th 2024, 08:00 local time.**

**Chair: Carol Ansley, Cox Communications**

**Secretary: Stéphane Baron**

**Vice-chairs: Jerome Henry, Cisco; Antonio DeLaOlivaDelgado, InterDigital, Inc**

**Technical editor: Po-Kai Huang, Intel**

Chair calls meeting to order at 08:02 Local time.

Agenda slide deck: [11-24-2117r3](https://mentor.ieee.org/802.11/dcn/24/11-24-1677-03-00bi-november-plenary-agenda.pptx):

1. Reminder to do attendance

Reminder to register for the session and to not attend the virtual meeting without paying appropriate meeting fees.

1. The chair mentioned the call for essential patents
   1. No one responded to the call for essential patents
2. Review of policies and procedures.
   1. IEEE individual process slides were presented.

No questions

1. The chair covered the IEEE copyright policy and participation rules.

No questions

1. Quick review of the hybrid meeting protocols

1. **Discussion of agenda 11-24-2117r3 (slide #16)**
   1. Discussion on agenda

Submission 135r1 is now uploaded and author request a timeslot to present . tentatively added to Tuesday PM2.

Phil request to move his presentation to Wednesday AM1.

Revision R4 is created accordingly.

* 1. Adoption of agenda revision 4 by unanimous consent (40 participants online, 26 in the room).

1. **Technical Submissions**
   1. [11-25/0044r1](https://mentor.ieee.org/802.11/dcn/25/11-25-0044-01-00bi-capability-bit-for-ds-mac-address.docx): Capability bit for DS MAC Address – Po-Kai Huang

Second presentation after offline comments taken into account on note 2.

* + 1. Discussion

No discussion

Author request a straw poll

**Straw Poll #3 : intial text**

Do you support the inclusion of 25/44r1 into the TGbi draft?

**Discussion on SP#3:**

No discussion.

**SP#3** accepted with unanimous consent

* 1. [11-24/1927r1](https://mentor.ieee.org/802.11/dcn/24/11-24-1927-01-00bi-cr-for-1145.docx): CR for 1145 – Po-Kai Huang

Document presented by Po kai.

The Document is an update of previous version after offline comment reception.

PMKID KDE is used instead of previous formula in r0

* + 1. Discussion

Q: I am a little concerned with the usage of the name “change” for the PMKID. Do we already use that in the draft earlier? Maybe replacing would be better?

A: I got your point but I think we can handle that later.

Q: Is this change is to mandate the associate /reassociation PMKID to be used?

A: Yes.

Q: If there are configuration where the assoc/reasoc is not encrypted. Could that be a management frame to assign PMKID?

A: This was part of 11bn discussion. For now, only assoc/reassoc is encrypted.

Q: I preferred previous version what is rational for changing.

A: To decouple the computation of the PMK.

Q: Is “changed” used as an adjective at the end of the text? Why do you need that?

A: This is to capture that the value changed.

C: I prefer “the new PMKID” because changed is usually not used as an adjective.

A: Ok.

C: I think we can reverse the way the sub clause is written to indicate the subclause reference after the definition of the PMKID.

Text changed to “the changed” with other editorial friendly modifications.

Revision r2 is created according.

Author request a straw poll on revision 2

**Straw Poll #4: initial text**

Do you support the inclusion of 24/1927r2 in the TGbi draft to resolve CID 1145?

Y/N/A

**Discussion on SP#4**

**No discussion on SP#4**

Chair ask if anybody object to approve this SP by unanimous consent.

1 people indicate will to abstain, so SP in run.

**SP#4 result** : 23 Y / 0N/ 19 A

* 1. [11-24/1999r1](https://mentor.ieee.org/802.11/dcn/24/11-24-1999-01-00bi-cr-for-edp-epoch-start-time.docx): CR for EDP epoch start time – Stéphane Baron

Document presented by Stephane.

The Document is an update of previous version after offline comment reception.

2 options are proposed:

* Option A: FirstTSFStartTime is constant, corresponds to the first TSF start time of the first epoch of the sequence for the AP. The AP then sends the TSF offset between the receiving link and the link used as reference to allow same computation for every stations.
* Option B: FisrtTSFStartTime is the first TSFStart time for the receiving non-AP STA, and the AP sends the current value of the sequence number ‘n’ in the EDP epoch sequence of the reference link.
  + 1. Discussion

C: I sent a document to the author to explicit an alternative to his initial proposal, but this is not integrated in this document.

A: I am sorry, but I had very little time to understand and integrate your proposal. I’ve done my best to explain my understanding of your proposal in the option B description.

Q: I still think you will have to maintain a new central reference time between links and this create drifting issues.

A: As explained earlier, this does not require the creation of a central reference time. The AP indicates to the station the offset between the receiving link and the link it selected as its internal reference to compute the ED epoch start time.

C: AP handle this offset anyway, since it is transmitted in the basic multi-link information element. No new computing here.

C: Option A is just a continuation of current draft content clarifying how to compute the GTn value.

Q: The AP has to maintain this initial time, right?

A: The parameters transmitted is a constant value that is initiated upon EDP epoch sequence creation there is no other further computation then. The AP just store it and send it.

C: In option B, the AP and STA’s just have to maintain the value ‘n’ and after the reception of the Epoch setting, each link is independent.

A: In option A, links are also independent after initial setup. The difference is that n is computed by stations upon reception of the setup frame, not received from the AP.

C: I think option B is much easier to explain and simple to implement. This is an important point regarding the acceptance of the solution.

A: The problem with solution B is that it does not take into account all the computing. It just considers EDP epoch start time computation. I don’t especially see how to compute GTn value that is used as seed for the pseudo random generation of all the EDP parameters in this case.

.

C: I think that it is confusing what option B is proposing.

Q: What maximum difference between links TSF counters?

A: This can be very large since the TSF counter on a link is initiated at its creation and link may be created at very different timings. But this difference is maintained around a constant value thanks to the TSF sent in beacons.

Conclusion: Wait for a complete proposal from the contributor of option B to be presented in a future session.

1. **AoB**

No other business

Next TGbi session is today PM2.

1. Chair Recess at 09:12

**3rd slot: Tuesday January 13th 2024, 16:00 local time.**

**Chair: Carol Ansley, Cox Communications**

**Secretary: Stéphane Baron**

**Vice-chairs: Jerome Henry, Cisco; Antonio DeLaOlivaDelgado, InterDigital, Inc**

**Technical editor: Po-Kai Huang, Intel**

Chair calls meeting to order at 16:02 Local time.

Agenda slide deck: [11-24-2117r4](https://mentor.ieee.org/802.11/dcn/24/11-24-1677-04-00bi-november-plenary-agenda.pptx):

1. Reminder to do attendance

Reminder to register for the session and to not attend the virtual meeting without paying appropriate meeting fees.

1. The chair mentioned the call for essential patents
   1. No one responded to the call for essential patents
2. Review of policies and procedures.
   1. IEEE individual process slides were presented.

No questions

1. The chair covered the IEEE copyright policy and participation rules.

No questions

1. Quick review of the hybrid meeting protocols

1. **Discussion of agenda 11-24-2117r4 (slide #16)**
   1. Discussion on agenda

Revision for the document 155 is now r1 author will present change and request a straw poll

SP is requested on 11\_24/46r3

Phil indicates his document number is 25/165r0

* 1. Adoption of agenda revision 5 by unanimous consent (27 participants online, 17 in the room).

1. **Technical Submissions**
   1. [11-24/1714r5](https://mentor.ieee.org/802.11/dcn/24/11-24-1714-05-00bi-proposed-spec-text-for-aid-anonymization.docx): Proposed spec text for AID anonymization – Domenico Ficara

Second presentation after comments taken into account.

Changes are:

* An update and harmonization of the size of the fields carrying AID list size and EDP epoch sequence duration.
* Making AID assignment response optional (success by default).
* Rules to allow registration of stations depending on max storage AID size.
  + 1. Discussion

Q: If a station has no more AID, it requested helps of the AP. Shouldn’t we say that the AP “shall” send and AID instead of should?

A: Agree.

Q: Shouldn’t the AP request helps when it will have no AID for future Epoch?

A: Not sure.

C: If a station has no AID, I think the station cannot operate since the AP may already have reassigned your AID. So, reassociate is the only solution. I propose to remove the part of the text that is related to the lack of AID.

C: I think we should defer this text for now.

C: I think this is quite a complex mechanism to have a varying size of the list of AID among time.

A: This is why when joining the group, you have to indicate the size you are supporting, and some other people argue that this should be good to have a flexibility for this size for given stations.

Q: Is there an analysis showing that no AID will be colliding during the transition period?

A: This is not the purpose of this document. This is the job of the AP to avoid that even if it is not easy.

C: you cannot say “such a frame” but rather “a such a frame”

A: Agree.

C: I think this a good contribution, we spent time to reach this point and I support it.

C: I think we can change the sentence indicating if you have no AID for next Epoch then you can request for help. If you have no AID at a moment of time you have to de-associate or the AP will de-associate you.

A: Agree.

C: We shall mention AP MLD instead of CPE AP MLD.

A: Agree.

Author will do the required modifications offline and will come back in a future session.

* 1. [11-25/0151r1](https://mentor.ieee.org/802.11/dcn/25/11-25-0155-01-00bi-sae-password-identifier-update.docx): SAE password identifier update – Jouni Malinen

Document presented by Jouni.

Second presentation after comments taken into account.

R1 has a requested extension where a STA can send multiple identifier

Note: The CID resolution is not in a table as usual but in the text itself.

* + 1. Discussion

C: We requested this modification because I was afraid of issues regarding the scalability of the proposed solution.

C: In addition, selecting among a list increases the probability of success.

Q: Now we have to store lots of identifiers that should be stored in many APs. Couldn’t we just randomize this password identifier?

A: This is done in a way AP vendor can easily do that. For stations this more data to store but the increase is not significant.

Q: Can we have this mechanism rather on client side handling the IDs?

A: If you really want a station to be in control while keeping privacy, next straw poll will help.

A: It is handled in the same way that in password id, the AP is responsible of that to avoid collision and make things simpler.

Author request a straw poll

Chair ask if anybody wants to run the SP .

1 people requested a vote.

Author requested a recorded SP.

**Straw Poll #5 initial text:**

Do you support the inclusion of 25/155r1 in the TGbi draft to resolve CID 1097?

Y/N/A

**Discussion on SP#5**

No Discussion

**Straw poll #5 results:** 15 Y/ 9 No / 5A.

|  |  |  |  |
| --- | --- | --- | --- |
| First Name | Last Name | Affiliation | Vote |
| Antonio | DeLaOlivaDelgado |  | Y |
| Carol | Ansley | Cox | Y |
| Dan | Harkins | HPE! | Y |
| Domenico | Ficara | Cisco | Y |
| Dong | Han |  | N |
| Dorothy | Stanley | HP Enterprise | Y |
| Duncan | Ho | (Qualcomm) | y |
| Ethan | Zimmer |  | A |
| Federico | Lovison |  | Y |
| gaborB |  |  | Y |
| Graham | Smith | SRT | Y |
| Jarkko | Kneckt |  | N |
| Javier | Contreras |  | Y |
| Jegan | Manoharan |  | N |
| Jerome | Henry | Cisco | A |
| Jinjing | Jiang |  | N |
| Jouni | Malinen | Qualcomm | y |
| Lochan | Verma |  | N |
| Mark | Hamilton | (CommScope/Ruckus) | A |
| Matt | Swartz |  | A |
| Philip | Hawkes | Qualcomm | Y |
| Shinya | Otsuki | (NTT) | A |
| Sidharth | Thakur | Apple | N |
| Stephane | Baron | (Canon) | Y |
| Stephen | Orr |  | Y |
| Tianyu | Wu |  | N |
| Ugo | Campiglio |  | Y |
| Yong | Liu |  | N |
| Yongho | Seok |  | N |

Discussion after SP#5 results:

C: I see that all the people voting no declared same affiliation.

C: I don’t think we should motion this document alone.

C: I don’t think we have a process for that.

C: Chair: From now on, we put in a common motion all the SPs that passes with unanimous consent.

* 1. [11-24/0046r3](https://mentor.ieee.org/802.11/dcn/24/11-24-0046-03-00bi-privacy-protection-for-sae-credentials.docx): Privacy Protection for SAE Credentials– Jouni Malinen

Document presented by Dan Harkins.

New presentation of a document already presented several times.

Provides a different way to present privacy credential.

Some people are complaining against privacy issue of previous document, this document solves that issue.

* + 1. Discussion

Q: Is this public key heavy to store and will increase the complexity and memory needs?

A: Key is not that long 32 Bytes.

Q: Can we have time to review it?

A: we review this document so many time…

C: I think it requires less memory resources for stations. On AP side it addresses the point not to refresh your device

Author request a recorded SP for this document 24/46r3.

**Straw Poll #6 initial text:**

Do you support the inclusion of 24/46r3 in the TGbi draft to resolve CID 1097?

Y/N/A

**Discussion on SP#6**

No Discussion

**Straw poll #6 results:** 8Y: 16N/ 8A.

|  |  |  |  |
| --- | --- | --- | --- |
| First Name | Last Name | Affililation | Vote |
| Antonio | DeLaOlivaDelgado |  | A |
| Brian | Hart | (Cisco Systems) | N |
| Carol | Ansley | Cox | y |
| Dan | Harkins | HPE! | Y |
| Domenico | Ficara | Cisco | N |
| Dong | Han |  | N |
| Dorothy | Stanley | HP Enterprise | Y |
| Duncan | Ho | (Qualcomm) | y |
| Ethan | Zimmer |  | A |
| Federico | Lovison |  | A |
| gaborB |  |  | Y |
| Graham | Smith | SRT | Y |
| Graham | Smith | SRT | Y |
| Jarkko | Kneckt |  | N |
| Javier | Contreras |  | N |
| Jegan | Manoharan |  | N |
| Jerome | Henry | Cisco | N |
| Jinjing | Jiang |  | N |
| Jouni | Malinen | Qualcomm | y |
| Lochan | Verma |  | N |
| Mark | Hamilton | (CommScope/Ruckus) | A |
| Matt | Swartz |  | A |
| Philip | Hawkes | Qualcomm | A |
| Qi | Wang |  | N |
| Reza | Hedayat |  | N |
| Shinya | Otsuki | (NTT) | A |
| Sidharth | Thakur | Apple | N |
| Stephane | Baron | (Canon) | A |
| Stephen | Orr |  | N |
| Ugo | Campiglio |  | N |
| Yong | Liu |  | N |
| Yongho | Seok |  | N |

* 1. [11-25/0135r2](https://mentor.ieee.org/802.11/dcn/25/11-25-0135-02-00bi-bpe-ap-discovery-text.docx): BPE AP Discovery Text – Jarkko Kneckt

Document presented by Jarkko.

Second presentation of the document.

Describing avoidance of passive scanning while maintaining privacy.

Claimed advantages are reduced connection time and power save.

* + 1. Discussion

Q: Do you mean the STA is sleeping, not listening to beacon?

A: Yes, during the discovery phase.

Q: Do you mean this will be performed in all the channels, all the time?

A: When associated, it will be done for roaming, this is only for the initial discovery.

Q: You are using identity key, not GTK, is it because GTK is per BSS? Why not using PGTK?

A: PGTK is not for data encryption.

C: You mention clause 12.14.3 EDP Capability [..], but this clause is not defined yet.

A: This is clause 12.16.4.

Q: Do you think that if the AP takes more time than the requested time, the AP does not transmit?

A: I think that the AP put for transmission between this time.

C: I think we should indicate if the frame is not queued for transmission in this time, the frame shall not be sent.

A: OK

Q: You mention equation 9-XX where is it?

A: It should be 10-XX.

C: You are requesting that the AP responds to unencrypted request in 5ms, I think this open the door to deny of service.

A: There is a should requirement, so if the AP cannot answer it will not.

C: I assume you mean STA have RSNE RSNXE, right?

A: This operation is before using the RSNXE; here, the station just detects if there is an AP in the proximity.

C: Now you are indicating that you have a pre-shared of the RSNE, RSNXE. I am not sure this is scalable if you have lots of AP around.

A: We do not mention what is pre-shared information exactly.

C: This is my comment. Depending on what you pre-shared it can be heavy. Previously you pre-shared only identity key. Now you extend the scope to pre-shared information. My understanding is that this information may contain RSNE and RSNXE and I am not in favor of that.

A: we can define the pre-shared information is a next round.

Q: You indicate that only associated stations can decrypt the beacon?

A: Yes, only stations that already associated knows the GTK and can decrypt.

Q: Why a station already associated want to decode beacons?

A: A station associated uses beacons to be aware of critical updates for instance.

Q: What “receivable” means?

A: I will find a better name for that.

Q: You indicates that a station is not associated and now you say it is associated to decrypt. What do you mean?

A: There are two steps. First the STA determines that the frame is from a valid AP, then associates and can decrypt beacons.

Q: So, the hash is in clear, not protected by the GTK?

A: Yes.

Q: So, the Hash is not part of the payload?

A: Right, this is part of the header.

Author will address received comment and come back with a new revision.

1. **AoB**

No other business

Next TGbi session is tomorrow PM1.

1. Chair Recess at 18:00

**4th slot: Wednesday January 15th 2024, 08:00 local time.**

**Chair: Carol Ansley, Cox Communications**

**Secretary: Stéphane Baron**

**Vice-chairs: Jerome Henry, Cisco; Antonio DeLaOlivaDelgado, InterDigital, Inc**

**Technical editor: Po-Kai Huang, Intel**

Chair calls meeting to order at 08:00 Local time.

Agenda slide deck: [11-24-2117r5](https://mentor.ieee.org/802.11/dcn/24/11-24-1677-05-00bi-november-plenary-agenda.pptx):

1. Reminder to do attendance

Reminder to register for the session and to not attend the virtual meeting without paying appropriate meeting fees.

1. The chair mentioned the call for essential patents
   1. No one responded to the call for essential patents
2. Review of policies and procedures.
   1. IEEE individual process slides were presented.

No questions

1. The chair covered the IEEE copyright policy and participation rules.

No questions

1. Quick review of the hybrid meeting protocols

1. **Discussion of agenda 11-24-2117r5 (slide #16)**
   1. Discussion on agenda

Phil change document number to 137

new version of document 135r4 will be presented

Document number 25/167r0 will be presented (not165)

timeslot is requested to present 1999r2

* 1. Adoption of agenda revision 6 by unanimous consent (27 participants online, 15 in the room).

Chair indicates that tomorrow session is dedicated to discussion if needed, and that Thursday PM2 will be dedicated to the motion to create draft 1.0.

1. **Technical Submissions**
   1. [11-25/0167r1](https://mentor.ieee.org/802.11/dcn/25/11-25-0167-00-00bi-text-for-hiding-sa-and-da.docx): Text for hiding SA and DA – Philip Hawkes

Document presented by Phil.

Very short document to add e note indicating a note that A-MSDU should be used if SA/DA protection is needed

* + 1. Discussion

Q: Why adding a note with a should statement, this should note be a note? I agree with the proposal.

A: OK

Text amended accordingly.

Q: Can we have a little more context for this change? Why do we do this statement standing alone at the end of the clause 10.71

A: 10.71 is an introductory clause.

C: I think this should be rather in clause 4 introductory where you introduce capabilities.

A: I can add this line at the end of clause 4.5.4.10a for instance.

Q: in my understanding we protect SA/DA in same way as other addresses?

A: SA/DA are DS MAC address transmitted in address 3 and Address 4.

C: I need more discussion to understand.

Q: The confidentiality of SA/DA can be provided by the use of A-MPDU. Is it what you mean?

A: agree

C: I disagree moving this sentence to clause 4. This is recommendation.

C: SA/DA is very different from obfuscating RA/TA using our amendment. Here we are talking od device addresses of any device we communicate with including device not using our amendment. Using A\_MSDU put those SA/DA in sub frame in the payload of the A-MSDU so this is an encrypted part and SA/DA privacy is then protected.

C: I speak in favor of the propose text here to provide confidentiality to the SA/DA addresses.

Q: Is it enough? Does it cover everything? Does it work for station transmitting a packet every 3 minutes?

A: If everyone follows this rule then yes. And we can have a A\_MSDU with a single MSDU embedded.

C: I think we are providing protection in our network.

Q: We should have differentiated sentences for CPE and BPE since in BPE we can have a shall statement because we only have EDP station.

A: Agree.

Text is split into two sentences.

Q: Can we keep it in 10.71.1?

A: Yes, since this is normative text, and we may move it once in the draft.

Author will create r1 and come back to straw poll it later on

* 1. [11-25/0135r4](https://mentor.ieee.org/802.11/dcn/25/11-25-0135-04-00bi-bpe-ap-discovery-text.docx): BPE AP Discovery Text – Jarkko Kneckt

New presentation from Jarkko on active scanning with privacy

Main change is timing of the privacy beacon transmission.

Privacy beacon is also shortened.

* + 1. Discussion

Editorial modification.

Q: What is the use of including this BPCC element?

A: To determine that the beacon is a valid one, and detect attack.

C: I think we do not need it in the payload. DTIM beacon counter can play this role.

C: I think we should create a new frame rather than using existing beacon frame format. The response can be a dedicated frame, not a beacon one. This makes thing more complex with no benefit.

A: The reception logic of the privacy beacon and this new frame are very similar this is why we reused frame format here.

C: I have strong issue using GTK for that frame that is a unicast frame. I assume we have unicast key.

A: Yes, but those keys are used for discovery.

Q: In 10.71.8.1 part you put the formula. Why not putting this in the discovery part where you are using it?

A: You mean order of clauses 10.71.8.1 and 10.71.8.2 is not correct, right?

A: yes.

Author will do necessary modification and will come back latter.

* 1. [11-24/1714r5](https://mentor.ieee.org/802.11/dcn/24/11-24-1714-05-00bi-proposed-spec-text-for-aid-anonymization.docx): Proposed spec text for AID anonymization – Domenico Ficara

Document presented by Jerome Henry.

Main modification is the “shall statement” requesting the AP to disassociate the station if the STA has no AID.

* + 1. Discussion

Q: Last sentence is not clear; does it mean that this is OK for a STA not having an AID if it doesn’t request being in an EDP group?

A: During an epoch the station may sleep, so there may be scenario where the STA has no AID, but this is OK. But I agree more scenario explanation may be needed.

Q: Can we consider the case the station doesn’t want an AID?

A: This is an interesting question; we can have station never using AID.

A: AID is a very old mechanism and a lot of features are relying on AID now. I don’t think this is an option. We may have station that don’t want to bother with AID, but this is out of scope of this amendment.

C: If you don’t want to change your AID, don’t activate EDP.

Author requested a SP.

**Straw Poll #7: text ;**

Do you support the addition of 24/1714r6 to the TGbi draft to resolve CIDs 1515, 1516?

**Discussion on SP#7**:

No discussion.

**SP#7** passes with unanimous consent.

* 1. [11-24/2116r1](https://mentor.ieee.org/802.11/dcn/24/11-24-2116-01-00bi-transition-related-spec-texts.docx): Transition-related spec texts – Carol Ansley

Document presented by Carol.

New presentation after received comment taken into account.

* + 1. Discussion

Q: do you remove the middle of the sentence in 9.3.1.5.2?

A: yes.

C: I think this is normative text for another amendment, this is better a REVmf stuff to change it.

A: I received other comments requesting this change.

C: I recommend people familiar with SIG to have a look on it.

C: This is coming up in MF this afternoon. This will be used as example of issues we face in clause 9.

C: I think this is correct to delete it.

A: for PS poll, this is needed to set MSBs set to 1

* Regarding clause 35.3.12.4.

Q: Do we need anything on this traffic identification clause, we are not addressing “addressing rules” here? I recommend removing this modification.

A: I make a very general sentence indicating following the addressing rules.

C: This is only covering PS poll and we have other ps mechanism not covered here.

Author defer the document for now to have time for offline discussion.

* 1. [11-25/0156r1](https://mentor.ieee.org/802.11/dcn/25/11-25-0156-01-00bi-proposed-edp-mib-changes.docx): Proposed EDP MIB Changes – Carol Ansley

Document presented by Carol.

This version includes a dedicated entry table for the EDP.

* + 1. Discussion

Editorial changes:

C: There is EPD instead of EDP in the text

A: Agree.

Q: dot11EHT is intentional here?

A: No, sorry, I will change that.

Q: For the first one, are they really ANA control items?

A: I will figure it out.

Author fix typos and upload r2 and SP will be run later on.

1. **AoB**

No other business

Next TGbi session is tomorrow AM1.

1. Chair Recess at 09:57

**5th slot: Thursday January 15th 2024, 08:00 local time.**

**Chair: Carol Ansley, Cox Communications**

**Secretary: Stéphane Baron**

**Vice-chairs: Jerome Henry, Cisco; Antonio DeLaOlivaDelgado, InterDigital, Inc**

**Technical editor: Po-Kai Huang, Intel**

Chair calls meeting to order at 08:01 Local time.

Agenda slide deck: [11-24-2117r6](https://mentor.ieee.org/802.11/dcn/24/11-24-2117-06-00bi-tgbi-january-interim-agenda.pptx):

1. Reminder to do attendance

Reminder to register for the session and to not attend the virtual meeting without paying appropriate meeting fees.

1. The chair mentioned the call for essential patents
   1. No one responded to the call for essential patents
2. Review of policies and procedures.
   1. IEEE individual process slides were presented.

No questions

1. The chair covered the IEEE copyright policy and participation rules.

No questions

1. Quick review of the hybrid meeting protocols

1. **Discussion of agenda 11-24-2117r6 (slide #16)**
   1. Discussion on agenda

C: Tech editor indicates he received a withdrawal request from their author of CIDs received by email.

C: List is as follow: 1514, 1520, 1523, 1524, 1525, 1526.

* 1. Adoption of agenda by unanimous consent (19 participants online, 11 in the room).

1. **Administrative**
2. **Technical Submissions**
   1. [11-24/1999r3](https://mentor.ieee.org/802.11/dcn/24/11-24-1999-03-00bi-cr-for-edp-epoch-start-time.docx): CR for EDP epoch start time – Stéphane Baron

Document presented by Stéphane.

This document is the result of a joint offline work between the co-author of the documents merging Solutions A and B of previous revision.

* + 1. Discussion

Q: How many bits for KDF length?

A: As indicated in the specification. 64 bits.

Q: About deltaIT, “n” should be different for each group to generate different results, right ?

A: deltaIT is also derived with PGTK that is different for each STA MLD, so results are different even if using the same seed. But I am open for discussion if needed to define a better seed.

A: OK agree.

Q What is RandTR?

A: This is a Time range of 16 bits that is used for deltaIT computation. It is provided during EDP epoch setup.

Q: Why using 64 bits for KDF? It is too strong.

A: I am open to change to 16 if needed.

Q: Why don’t you use PRF? it would be enough for this.

A: Initially I used PRF, then I received some comments that we should rather use KDF. I am open to change back but we need to discuss.

C: Please don’t change back. KDF here is going to be a single HMAC-SHA256, there is no difference to PRF in this case.

Q: Could you align to EDP element wording when you use formula and variable for computing EDP Epoch start time (ex: randTR)?

A: OK I will check.

C: Regarding delta T generation: As a side note, it might be cleaner to define a new function for deriving a random integer in range 0..n with some context provided as seed/key, but this can wait for D1.0 LB.

No other comments. Some editorial changes are needed.

Author will come back latter in this session for the SP.

* 1. [11-25/0167r1](https://mentor.ieee.org/802.11/dcn/25/11-25-0167-01-00bi-text-for-hiding-sa-and-da.docx): Text for hiding SA and DA – Philip Hawkes

Document presented by Phil.

New presentation after comments taken into account.

* + 1. Discussion

No discussion

**SP#8** : Do you support the inclusion of 25/0167r1 in the TGbi draft?

**SP#8** received unanimous support

* 1. [11-25/0156r2](https://mentor.ieee.org/802.11/dcn/25/11-25-0156-02-00bi-proposed-edp-mib-changes.docx): Proposed EDP MIB Changes – Carol Ansley

Document presented by Carol.

New revision after comment taken into account.

* + 1. Discussion

No discussion

**SP#9**: Do you support the inclusion of 25/0156r2 in the TGbi draft?

**SP#9** received unanimous support

* 1. [11-25/0135r5](https://mentor.ieee.org/802.11/dcn/25/11-25-0135-05-00bi-bpe-ap-discovery-text.docx) -- BPE AP Discovery -- Jarkko Knecht

Document presented by Jarkko

New presentation taken into account comments received during previous presentation.

* + 1. Discussion

Q: Id key is 126 bit and now request 48 bits as the end. This is not for security you don’t need 128 bits identifier it seems excessive

A: Can we keep this definition for the next round after D1.0?

A: Identity computation is repeated very often and request efficient operation. More discussion is needed to determine the best choice of algorithm and key.

C: I don't think this submission is critical for 1.0

C: I support to push this into D1.0

Chair requests if anybody object approving this document by unanimous consent.

1 member requested a count.

**SP #10** is then run.

**SP#10 initial text**:

Do you support the inclusion of 25/135r6 in the TGbi draft?

Y/N/Abs

**Discussion on SP#10:**

No discussion

**SP #10 results**: 16 Y / 1N/ 2 Abs

* 1. [11-24/1999r7](https://mentor.ieee.org/802.11/dcn/24/11-24-1999-07-00bi-cr-for-edp-epoch-start-time.docx): CR for EDP epoch start time – Stéphane Baron

Document presented by Stéphane.

New revision after comment taken into account.

* + 1. Discussion

No discussion

**SP#11**: Do you support the inclusion of 24/1999r7 in the TGbi draft?

**SP#11** received unanimous support

* 1. [11-25/0176r0](https://mentor.ieee.org/802.11/dcn/25/11-25-0176-00-00bi-resolution-for-cid-1004.docx): resolution for CID 1004 – Po-Kai Huang

Document presented by Po-Kai.

Slight modification on 10.71.8 to solve last CID 1004

* + 1. Discussion

No discussion

**SP#121**: Do you support the inclusion of 25/0176r0 in the TGbi draft to resolve CID1004?

**SP#11** received unanimous support

1. **AoB**

Q: Did we solve all the CIDs?

A: yes?

Q: Can we do motion now?

A: Chair: Since I announced the motion occurring in PM1 I prefer to keep that, and we need time to prepare the motion text.

Next TGbi session is tomorrow PM1.

1. Chair Recess at 09:35

**6th slot: Thursday January 15th 2024, 13:30 local time.**

**Chair: Carol Ansley, Cox Communications**

**Secretary: Stéphane Baron**

**Vice-chairs: Jerome Henry, Cisco; Antonio DeLaOlivaDelgado, InterDigital, Inc**

**Technical editor: Po-Kai Huang, Intel**

Chair calls meeting to order at 13:31 Local time.

Agenda slide deck: [11-24-2117r8](https://mentor.ieee.org/802.11/dcn/24/11-24-2117-08-00bi-tgbi-january-interim-agenda.pptx):

1. Reminder to do attendance

Reminder to register for the session and to not attend the virtual meeting without paying appropriate meeting fees.

1. The chair mentioned the call for essential patents
   1. No one responded to the call for essential patents
2. Review of policies and procedures.
   1. IEEE individual process slides were presented.

No questions

1. The chair covered the IEEE copyright policy and participation rules.

No questions

1. Quick review of the hybrid meeting protocols

1. **Discussion of agenda 11-24-2117r8 (slide #16)**
   1. Discussion on agenda

Q: we have a contribution on association Ids and power save period and would like to present.

A: OK, after the motion.

A: Thank you

Q: we will consider this presentation that may or may not go in D1.0. Do we change D1.0 after?

A: Yes, the bg motion creates D1.0 but we can add material.

C: Tech editor: I recommend not rushing and try to integrate material now.

A: We will see how many comments we will get.

C: considering the content I recommend considering it.

* 1. Adoption of agenda by unanimous consent (63 participants online, 30 in the room).

1. **Motions #54 initial text :**

Approve directing the Editor to create a Draft 1.0 with the texts and CID resolutions that have reached consensus within the group and and approve a 30 day Working Group Technical Letter Ballot asking the question " Should P802.11 TGbi D1.0 be forwarded to Working Group Ballot?".

Specifically:

Document 24/2084r0 to resolve CIDs : 1518, 1522

Document 24/1679r3 to resolve CID  : 1427

Document 24/1579r10 to resolve CIDs : 1519, 1122, 1157, 1376

Document 24/1739r2 to resolve CIDs : 1109, 1166

Document 24/1936r3 to resolve CIDs : 1028, 1049, 1058, 1071, 1103, 1350, 1500

Document 24/1741r2 to resolve CIDs : 1046, 1187, 1188, 1190, 1191

Document 25/44r1.

Document 24/1927r2 to resolve CID 1145

Document 24/1714r6 to resolve CIDs : 1515, 1516

Document 25/167r1

Document 25/156r2

Document 25/153r1 to resolve CIDs : 1112, 1118, 1176

Document 25/176r0 to resolve CID : 1004

Document 24/1999r7 to resolve CIDs : 1031, 1050, 1051, 1052, 1080, 1244, 1245, 1246, 1247, 1248, 1249, 1250, 1251, 1252, 1253, 1254, 1256, 1259, 1260, 1265, 1266, 1267, 1268

**Discussion on motion #54:**

Q: Can we have document 135r6 in the motion 54?

A: motion 54 only contains SP passed without objection (unanimous). SP on 135r6 was run and 1 people voted No. This is why this is not in the motion 54.

Q: Who confirms that motion #54 documents are approved unanimously?

A: Secretary: I confirm that all the documents listed in the motion#54 passed a SP with unanimous consent.

Q: It is strange to create a D1.0 by adding material. I would suggest to add all changed material first in existing draft whatever and then Create D1.0 based on that.

Motion#54 text modified accordingly

**Motion #54 final text:**

Approve the texts and CID resolutions listed below and incorporate the indicated text changes into the TGbi draft.

Document 24/2084r0 to resolve CIDs : 1518, 1522

Document 24/1679r3 to resolve CID  : 1427

Document 24/1579r10 to resolve CIDs : 1519, 1122, 1157, 1376

Document 24/1739r2 to resolve CIDs : 1109, 1166

Document 24/1936r3 to resolve CIDs : 1028, 1049, 1058, 1071, 1103, 1350, 1500

Document 24/1741r2 to resolve CIDs : 1046, 1187, 1188, 1190, 1191

Document 25/44r1.

Document 24/1927r2 to resolve CID 1145

Document 24/1714r6 to resolve CIDs : 1515, 1516

Document 25/167r1

Document 25/156r2

Document 25/153r1 to resolve CIDs : 1112, 1118, 1176

Document 25/176r0 to resolve CID : 1004

Document 24/1999r7 to resolve CIDs : 1031, 1050, 1051, 1052, 1080, 1244, 1245, 1246, 1247, 1248, 1249, 1250, 1251, 1252, 1253, 1254, 1256, 1259, 1260, 1265, 1266, 1267, 1268

**Motion #54 moved by Po-Kai Huang and seconded by Jerome Henry**

**Motion #54: discussion on the motion**

**No discussion**

**Motion #54: result motion approved with unanimous consent (74 people online , 30 in the room)**

**Motion #55 initial text:**

Approve the texts and CID resolutions listed below and incorporate the indicated text changes into the TGbi draft.

Specifically:

Document 25/155r1 to resolve CID 1097

Document 25/135r6

**Discussion on Motion #55:**

Q: Can we split this motion into two motions since there was objection for both.

C: I think this can be done since there are different topics here.

C: My recommendation is to run the motion and if it fails we can run separately.

People request recorded vote

Q: Can people update their affiliation and voting status?

A: agree

**Motion #55: Moved by Jouni Malinen. Seconded by Jerome Henry.**

**Notion #55 final result**: Motion #55 Failed (30Y, 13N, 4A) After removal of duplicates votes, and people voting after the end of the vote period.

Recorded votes:

|  |  |  |  |
| --- | --- | --- | --- |
| **First Name** | **Last Name** | **Affiliation** | **Vote** |
| Abdel | Ajami |  | N |
| Abhishek | Patil | (Qualcomm) | Y |
| Ali | Raissinia | Qualcomm Inc. | Y |
| Antonio | de la Oliva | Interdigital | Y |
| Dan | Harkins | HPE! | Y |
| Daniel | Borges |  | N |
| Dave | Halasz | Morse Micro | y |
| Dong | Han |  | N |
| Dorothy | Stanley | HP Enterprise | Y |
| Duncan | Ho | (Qualcomm) | y |
| Federico | Lovison |  | Y |
| Fumihide | Goto | DENSO | Y |
| GaborB | Mediatek |  | A |
| Gaurang | Naik | Qualcomm Technologies Inc. | Y |
| Gaurav | Patwardhan | HPE | Y |
| George | Cherian | (Qualcomm) | y |
| Graham | Smith | SRT | Y |
| Helene | Ralle | (Orange) | Y |
| Hirohiko | INOHIZA | (Canon) | Y |
| Hitoshi | MORIOKA | SRC Sotware | Y |
| Jarkko | Kneckt |  | N |
| Javier | Contreras |  | Y |
| Jinjing | Jiang |  | N |
| John | Wullert | Peraton Labs | Y |
| Joseph | Levy | Interdigital | Y |
| Jouni | Malinen | Qualcomm | y |
| Mark | Hamilton | (CommScope/Ruckus) | y |
| Massinissa | Lalam | Sagemcom | A |
| Nehru | Bhandaru | (Broadcom) | A |
| Po-Kai | Huang | Intel | N |
| Pooya | Monajemi | Apple | N |
| Qi | Wang |  | N |
| Reza | Hedayat |  | N |
| Sanket | Kalamkar | (Qualcomm) | Y |
| Shinya | MIWA | Canon | Y |
| Sidharth | Thakur | Apple | N |
| SK | Yong |  | N |
| Stephane | Baron | (Canon) | Y |
| Stephen | Rodriguez | |Cisco | Y |
| Tianyu | Wu |  | N |
| TJ | Kang | Broadcom | Y |
| Ugo | Campiglio |  | y |
| William | Li | (Spreadtrum) | A |
| Yong | Liu |  | N |
| Youhan | Kim | (Qualcomm Technologies Inc.) | Y |
| Yuki | FUJIMORI | (Canon) | Y |
| Yuki | Tsujimaru | (Canon) | Y |

**Motion 56:**

**Recorded motion :**

**Motion #56 text :**

Approve the texts and CID resolutions listed below and incorporate the indicated text changes into the TGbi draft.

Specifically:

Document 25/155r1 to resolve CID 1097

**Motion, 56 move by Dan Harkins seconded by peter Yee**

**Discussion on Motion# 56**

No discussion

**Motion result : Motion #56 fails (28Y / 12N / 3A)**

Recorded votes:

|  |  |  |  |
| --- | --- | --- | --- |
| **First Name** | **Last Name** | **Affiliation** | **Vote** |
| Abdel | Ajami |  | N |
| Abhishek | Patil | (Qualcomm) | Y |
| Ali | Raissinia | Qualcomm Inc. | Y |
| Carol | Ansley | Cox | y |
| Dan | Harkins | HPE! | Y |
| Daniel | Borges |  | N |
| Dave | Halasz | Morse Micro | y |
| Dong | Han |  | N |
| Dorothy | Stanley | HP Enterprise | Y |
| Duncan | Ho | (Qualcomm) | y |
| Federico | Lovison |  | A |
| GaborB |  | Mediatek | Y |
| Gaurang | Naik | Qualcomm Technologies Inc. | Y |
| Gaurav | Patwardhan | HPE | Y |
| Graham | Smith | SRT | Y |
| Helene | Ralle | (Orange) | Y |
| Hirohiko | INOHIZA | (Canon) | Y |
| Hitoshi | MORIOKA | SRC Software | Y |
| Jarkko | Kneckt |  | N |
| Javier | Contreras |  | Y |
| Jinjing | Jiang |  | N |
| John | Wullert | Peraton Labs | y |
| Joseph | Levy | Interdigital | Y |
| Jouni | Malinen | Qualcomm | y |
| Mark | Hamilton | (CommScope/Ruckus) | y |
| Massinissa | Lalam | Sagemcom | A |
| Nehru | Bhandaru | (Broadcom) | A |
| Peter | Yee | NSA-CSD | Y |
| Pooya | Monajemi | Apple | N |
| Qi | Wang |  | N |
| Reza | Hedayat |  | N |
| Sherief | Helwa | Qualcomm Technologies Inc. | Y |
| Shinya | MIWA | Canon | Y |
| Sidharth | Thakur | Apple | N |
| SK | Yong |  | N |
| Stephane | Baron | (Canon) | Y |
| Stephen | Rodriguez | Cisco | Y |
| Tianyu | Wu |  | N |
| Ugo | Campiglio |  | y |
| William | Li | (Spreadtrum) | Y |
| Yong | Liu |  | N |
| Yuki | FUJIMORI | (Canon) | Y |
| Yuki | Tsujimaru | (Canon) | Y |

Post result discussion:

Q: Can I complain against a fair un equitable consideration of people since this is obviously a blocking vote from a single company?

A: You can bring it to the attention of the program manager Cristy Barns

C: I have a technical comment against this document and this is the very first time this contribution is presented so it is difficult to evaluate the technical content in a very short time.

**Motion #57:**

**Motion #57 text:**

Approve the texts and CID resolutions listed below and incorporate the indicated text changes into the TGbi draft.

Specifically:

Document 25/135r6

**Motion #57: Moved by Jarkko Kneckt seconded by Stephane Baron.**

**Motion #57 result: Motion #57 passes (32Y, 5N, 6A)**

**Recorded votes:**

|  |  |  |  |
| --- | --- | --- | --- |
| **First name** | **Last name** | **Affiliation** | **Vote** |
| Abdel | Ajami |  | Y |
| Antonio | de la Oliva | Interdigital | A |
| Carol | Ansley | Cox | y |
| Dan | Harkins | HPE! | N |
| Daniel | Borges |  | Y |
| Dave | Halasz | Morse Micro | n |
| Dong | Han |  | Y |
| Dorothy | Stanley | HP Enterprise | N |
| Duncan | Ho | (Qualcomm) | A |
| Federico | Lovison |  | Y |
| Fumihide | Goto | DENSO | Y |
| Gaurav | Patwardhan | HPE | N |
| Graham | Smith | SRT | Y |
| Helene | Ralle | (Orange) | Y |
| Hirohiko | INOHIZA | (Canon) | Y |
| Hitoshi | MORIOKA | SRC Software | A |
| Jarkko | Kneckt |  | Y |
| Javier | Contreras |  | Y |
| Jerome | Henry | Cisco | Y |
| Jinjing | Jiang |  | Y |
| John | Wullert | Peraton Labs | y |
| Joseph | Levy | Interdigital | A |
| Jouni | Malinen | Qualcomm | a |
| Mark | Hamilton | (CommScope/Ruckus) | y |
| Massinissa | Lalam | Sagemcom | N |
| Matt | Swartz |  | Y |
| Nehru | Bhandaru | (Broadcom) | Y |
| Peter | Yee | NSA-CSD | Y |
| Po-Kai | Huang | Intel | Y |
| Pooya | Monajemi | Apple | Y |
| Qi | Wang |  | Y |
| Reza | Hedayat |  | A |
| Shinya | MIWA | Canon | Y |
| Sidharth | Thakur | Apple | Y |
| SK | Yong |  | Y |
| Stephane | Baron | (Canon) | Y |
| Stephen | Rodriguez | Cisco | Y |
| Tianyu | Wu |  | Y |
| Ugo | Campiglio |  | y |
| William | Li | (Spreadtrum) | Y |
| Yong | Liu |  | Y |
| Yuki | FUJIMORI | (Canon) | Y |
| Yuki | Tsujimaru | (Canon) | Y |

**Motion #58 :**

Text of the motion modified under guidance of 802.11 chairman

**Motion #58 text :**

Having approved changes to the P802.11 TGbi draft as recorded in 24/2117r9, instruct the Editor to prepare P802.11 TGbi D1.0 and approve a 30 day Working Group Technical Letter Ballot asking the question

"Should P802.11 TGbi D1.0 be forwarded to SA Ballot?".

**Motion #58 Moved by Jouni Malinen. Seconded by Joseph Levy.**

**Discussion on the motion #58**:

C: There is one comment not resolved for this comment resolution

A: This is comment collection we do not need to solve all our comments.

C: Even if I am against this way of doing, in interest of time I will not complain but put the comment again on Draft 1.0

**Motion #58 result : Motion #58 passes (39Y/ 1N / 3A)**

**Recorded votes:**

|  |  |  |  |
| --- | --- | --- | --- |
| **First Name** | **Last Name** | **Affiliation** | **Vote** |
| Abdel | Ajami |  | y |
| Antonio | de la Oliva | Interdigital | Y |
| Carol | Ansley | Cox | y |
| Dan | Harkins | HPE! | A |
| Daniel | Borges |  | y |
| Dave | Halasz | Morse Micro | y |
| Dong | Han |  | Y |
| Duncan | Ho | (Qualcomm) | y |
| Federico | Lovison |  | Y |
| Fumihide | Goto | DENSO | Y |
| GaborB |  | Mediatek | Y |
| Gaurang | Naik | Qualcomm Technologies Inc. | Y |
| Gaurav | Patwardhan | HPE | Y |
| Graham | Smith | SRT | Y |
| Helene | Ralle | (Orange) | Y |
| Hirohiko | INOHIZA | (Canon) | Y |
| Hitoshi | MORIOKA | SRC Sotware | A |
| Jarkko | Kneckt |  | Y |
| Javier | Contreras |  | Y |
| Jerome | Henry | Cisco | Y |
| Jinjing | Jiang |  | Y |
| John | Wullert | Peraton Labs | y |
| Joseph | Levy | Interdigital | y |
| Jouni | Malinen | Qualcomm | y |
| Mark | Hamilton | (CommScope/Ruckus) | n |
| Massinissa | Lalam | Sagemcom | A |
| Nehru | Bhandaru | (Broadcom) | Y |
| Peter | Yee | NSA-CSD | Y |
| Po-Kai | Huang | Intel | Y |
| Pooya | Monajemi | Apple | Y |
| Qi | Wang |  | Y |
| Reza | Hedayat |  | Y |
| Shinya | MIWA | Canon | Y |
| Sidharth | Thakur | Apple | Y |
| SK | Yong |  | Y |
| Stephane | Baron | (Canon) | Y |
| Stephen | Rodriguez | Cisco | Y |
| Tianyu | Wu |  | Y |
| Ugo | Campiglio |  | y |
| William | Li | (Spreadtrum) | Y |
| Yong | Liu |  | Y |
| Yuki | FUJIMORI | (Canon) | Y |
| Yuki | Tsujimaru | (Canon) | Y |

**Post motion discussion:**

Q: When can we expect the draft 1.0?

A: Tech editor: I would say at least in 1 week.

Chair ask if presenter of document 11-25/0174 wants to present.

A: No, it seems difficult.

Doc 11-25/0174. Presentation is deferred.

Q: Should we have any telecon until the ballot closes?

A: Considering people will spend time to validate D1.0, I recommend not having teleconferences.

C: The best you can do, according to this planning you may have no telecon until next meeting in March.

A: agree, we may schedule a telecon 2 days before the meeting.

C: I f we are not careful we could be in ballot during next meeting. Just keep an eye on that.

A: Tech editor: I usually spend a week, so this time I set a dead line on Friday to secure this.

**AOB:**

Q: How many sessions will you request for March.

A: Probably 5.

1. **Chair adjourn at 14:45.**