 

IEEE P802.21 Media Independent Handover Services

Minutes of the IEEE P802.21 Working Group

Session #54 Meeting, Vancouver, BC, Canada

DCN 21-13-0056-00-0000

Chair: Subir Das

Vice Chair: H Anthony Chan

Editor: David Cypher

Secretary: Charles E. Perkins

# First Day AM1 (8:00pm-9:00pm): Regency C/D ; Monday, Jan. 14, 2013

## 802 Plenary Meeting; 802.21 updates by Subir

### 802.21c completion of comment resolution for recirculation

### 802.21d meeting also meeting

# First Day PM1 (1:30pm-3:00pm):Lord Byron ; Monday, Jan. 14, 2013

## 802.21 WG Opening Plenary: Meeting is called to order by Subir Das, Chair of IEEE 802.21WG with opening notes (21-13-0010-00-0000 ).

## Approval of the January 2013 Meeting Agenda (21-12-0191-01-0000)

### 802.21d Monday PM-1 and 802.21c Tuesday AM-1 have been swapped

## IEEE 802.21 Session #54 Opening Notes (21-13-0010-00-0000 )

### Attendance procedures

### Duty to inform, etc.

### Question on call for Intellectual Property declaration: No one declared

### New member count = 0

### Objectives and Status

#### 802.21c: Single Radio Handovers

#### Finalize the comment resolution document and prepare for LB6 re-circulation

#### 802.21d : Multicast Group Management

#### Discuss the proposals

### Future Sessions

### Task group presentations 802.21c (short verbal report) and 802.21d (21-13-013-00)

## IEEE 802 Joint Opening Plenary Report (21-13-0009-00-0000)

### Future Project Discussion

### Future meeting logistics

## Approval for minutes from Session #53 plenary meeting 21-13-0011-00 was delayed pending review.

## 802.21c (Anthony Chan) : Four meeting sessions planned

### Teleconference sessions went through comments

### Objectives for this meeting – technical points to resolve and new proposals

## 802.21d (Yoshihiro Ohba): three meetings planned

### Detailed presentation for three proposals (some of the previous 7 proposals were merged)

### Goal is to try to identify further harmonization

### Unlikely to make decision this week ;

### No new proposals will be accepted

### Agenda was captured in DCN 21-13-0007-00

## 802.21 future meetings

### Future Project Discussion

### Future meeting logistics

## Other meetings of interest to 802.21

### TV White Space

# Day 4 AM2 (10:30am-12:30pm): Lord Byron; Thursday, Jan.17, 2013

## 802.21 WG Closing Plenary: Meeting is called to order by Subir Das, Chair of IEEE 802.21WG.

## 802.11 report (21-13-0024-01) by Clint Chaplin (Report updated after meeting, some group meetings were still in session)

### Now have 802.11ak = GLK and 802.1q = PAD

### 802.11ac = finished resolving 252 comments, balloted to send out recirculation

### 802.11af = had ballot closed last August – they discovered in November that comments were not resolved

### 802.11ah – 20 specifications submissions, passed 20 motions

### 802.11ai – needs updates

### 802.11aj – interim meets in China, nothing to report now

### 802.11ak – General Link

### 802.11aq – nothing new

### 802.11 WNG – is there a NG PHY? May start BOFs. May start “interest groups” a la 802.15

### Architecture SC: P1905.1 comments closed – 802.11 comments were “lost” (Mark Hamilton)

## Report on IEEE / IETF coordination (Subir)

### – new RFC( update to RFC 4441rev) is to be produced

### – another leadership meeting is scheduled in March, 2013

### – will report about that meeting in March Plenary

## IETF liaison report by Yoshihiro Ohba (DCN 21-13-0018-00)

### DMM

#### Several solution proposals were mentioned

### Netext

#### IPv4 Offload

#### March meeting is canceled

### MIF

#### RFC 6731

### ROLL

### RMT

#### Fcast, flute in Last Call

## 802.21d closing report by Yoshihiro Ohba (21-13-0016-00)

### Proposal Presentation phase II for three proposals (DCN 2,3,4)

### Proposal Presentation phase III in March Plenary meeting

### Submission deadline for phase III is March 10 (Sunday end of day AOE)

### Three teleconference slot schedule

## 802.21c closing report by Anthony Chan (21-13-0019-01)

### Teleconference minutes

### Comments resolution to LB6

### P802.21c/D02 to be combined from

#### 21-13-0021-00 Comments resolution complete

#### 21-13-0023-01 Signaling

#### 21-13-0005-01 proxy

### Five 802.21c sessions in Vancouver: M\_PM2, Tu\_AM2, W\_AM2, W\_PM2, Th\_AM1

### Four teleconference scheduled

## WG Teleconferences

## Minutes for November meeting #53 (DCN 21-13-0022-00) approved

## Motions

### Produce Draft D02: For/Against/Abstain: Passed 8/0/0

### Forward Draft D02 for Sponsor Ballot: For/Against/Abstain = Passed 8/0/0

## 802.21 Session #54 closing report (DCN 21-13-0020-00

# Minutes of January 2013 802.21c TG Meeting (21-13-0036-02-srho)

## Day1 PM2 (4:00PM-6:00PM): Lord Byron; Monday, Jan. 14, 2013

### Meeting is called to order by Anthony Chan, chair of 802.21c TG, with agenda (DCN# 21-13-0012-00).

### Nov 27 teleconference minutes (DCN# 21-12-0181-00) was approved with unanimous consent.

### Dec 4 teleconference minutes (DCN# 21-12-0188-00-srho) was approved with unanimous consent.

### Dec 11 teleconference minutes (DCN# 21-12-0187-00-srho) was approved with unanimous consent.

### Dec 18 teleconference minutes (DCN# 21-12-0193-00-srho) was approved with unanimous consent.

### Jan 8 teleconference minutes (DCN# 21-13-0008-00-srho) was approved with unanimous consent.

### Comment on “Align IEEE 802.21c with 802.21a key derivation” (DCN# 21-13-0006-09) was discussed.

The contribution was to align IEEE 802.21c key derivation with the algorithm and naming conventions of 802.21a. . . It was identified that there are some relationships with 802.21a specification. It was recommended that Charlie and Yoshi should continue the discussion on security issues and improve IEEE 802.21c standard Draft.

### “Comment on P802.21cD01 Clause 11” (DCN# 21-13-0001-01) was discussed.

The need for a separate resolution documents categorized by clauses was mentioned. It was also suggested to have comment numbers inserted in a separate resolution documents

Comment resolution discussion on Clause 11 continued.

### “Comment on Gateway Service in Draft 802.21c (DCN#21-13-0005-00)” was discussed.

Proxy Function was introduced as a Gateway Service. It was mentioned that the Proxy Function was discussed in previous teleconferences and agreed.

### “LB comments and resolution (DCN# 21-12-0165-09)” were captured and presented. .

## Day2 AM2 (10:30AM-12:30PM): Lord Byron; Tuesday, Jan. 15, 2013

### Meeting is called to order by Anthony Chan, chair of 802.21c TG, with agenda (DCN# 21-13-0012-01).

Comment resolutions from comment #43 in “LB comments and resolution (DCN# 21-12-0165-09) continued.

### Figure 10b of IEEE 802.21c draft (D0) was updated and proposed.

For Figure 10b, SRHO-Capable device was discussed. “SRHO-Capable device” was defined as a network node that implements one or more commands such as MIH\_Prereg\_Xfer from this specification document.

## Day3 AM2 (10:30AM-12:30PM): Lord Byron; Wednesday, Jan. 16, 2013

### Meeting is called to order by Anthony Chan, chair of 802.21c TG, with agenda (DCN# 21-13-0012-00).

### Updated key derivation discussion was captured in

Figure 47 and was discussed.

### Chair explained procedures for the second Letter Ballot.

It was also mentioned that the IEEE 802.21c PAR needs to be extended during March plenary meeting.

### TG discussed and clarified some assumptions and definitions of the draft.

## Day3 PM2 (4:00PM-6:00PM): Lord Byron; Wednesday, Jan. 16, 2013

### Meeting is called to order by H. Anthony Chan, chair of 802.21c TG, with agenda (DCN# 21-13-0012-00).

### Proxy Function was discussed.

Proxy Function was separated into Proxy of PoA and Proxy of Information Repository using Figure 10b. Proxy of PoA and Proxy of Information Repository were proposed and discussed.

### Following teleconference time was proposed by Chair:

Feb 12, Feb 19, Feb 26, and Mar 5, 2013

### Chair discussed = the motions that he will be bringing to Working Group.

Two motions were discussed and as follows.

* Motion: Move to authorize the P802.21c Editor to incorporate all the resolutions of letter ballot #6 comments to revise draft P802.21c/D02
* Motion: Motion to authorize the Working Group chair to initiate a LB#6 re-circulation Letter Ballot on the question “Should P802.21c/D02 be forwarded to Sponsor Ballot.”

## Day4 AM1 (8:30AM-10:00AM): Lord Byron; Thursday, Jan. 17, 2013

### Meeting is called to order by H. Anthony Chan, chair of 802.21c TG, with agenda (DCN# 21-13-0012-00).

### IEEE 802.21c updated draft was shown and discussed

### “ Comment Resolution on Gateway Service in Draft 802.21c described in (DCN#21-13-0005-01),” “d02-lb-rev-10g-clean (DCN# 21-13-0021-00),” and “draft 802.21c signaling process (DCN#21-13-0023-00)” were discussed and accepted and resolutions will be captured in the updated IEEE 802.21c Draft.

### The meeting adjourned at 10:00 AM

# Minutes of the IEEE P802.21d Group Management Task Group (21-13-0025-00-MuGM)

## First Day AM1 Meeting: Lord Byron; Tuesday, January 15

### Meeting called to order by Chair at 8:04AM

Call for volunteer to take the minutes. Karen Randall is the minutes-taker for Tuesday AM1

### Meeting Agenda (21-13-0007-01) is presented by the Chair

The IEEE 802.21d task group is scheduled to meet Tuesday AM1, PM2, Wednesday AM1, and Thursday AM1. The agenda was approved with no objections.

### Meeting Minutes Approval

Meeting minutes from the November meeting are in DCN 12-175-00; approved with no objections.

### Opening Notes (21-13-0013-00) is presented by the Chair

Slides #1-#4 shown, Note Well, Duty to Inform

Call for essential patents (No one responds)

Officers (Editor TBD, Secretary TBD)

TGd Schedule , and so on

In November 2012, there were 7 proposals; however currently there are three (see DCN 13-0002-01, 0003-00, and 004-00) since there are no new proposals as of this meeting; only revised proposals will be accepted. The second presentations for the proposals will be given during this meeting. There will be one more opportunity for proposal presentations (at the March 2013 meeting) followed by harmonization and final down-selection in May 2013.

### Presentation made by Yoshikazu Hanatani

Proposal was presentation by Yoshikazu Hanatani, DCN 21-13-0014-00. .

The presentation reviewed the system architecture, new commands, and primitives and messages.

He also discussed the detailed proposal, DCN 21-13-0002-2. This proposal has two procedures: a group manipulation procedure based on Media Key Block (MKB) and a group command procedure.

Question asked about defining the Media independent handover function identifier (MIHF ID). This proposal has an identifier that identifies a set of nodes which may be confusing since the MIHF function typically resides in a single node. It was suggested that it may be useful to modify it so that it is clear that it’s for a group (e.g., MIHG-ID) to be.

It should be clear in Clause 9.5.1 and 9.5.2 that text will be added (and the current text is not removed).

It was asked about the certificate serial number. Since the certificate has a serial number (for unique identification by issuing authority), there may be no need to specify another unique identifier. Clarification was requested for the text in 9.4.4.2 that describes how to identify which key is to be used for signature verification.

Some members felt the proposal was good and fits with their ideas. He had several comments and questions that were discussed. The member suggested reconsidering the definition of MIHF ID in 8.3.1; he was concerned that adding the “G” for Group may not be the best solution.

There was a question regarding the primitives specified for the managing groups. How does the mobile node know the multicast address of the group? In 8.6.3.24, the multicast address is received from the POS; the POS MIHF has a group information database with the multicast address, group ID, and master group key. There were also some discussions about the MIH Group Manipulate and Group Link Action; there may need to be some clarifications of the text.

In 9.4.1 (page 28, Step 2), there is a statement about delivering both encrypted and unencrypted payload. It was thought that this is not supported by the rest of this proposal nor currently in IEEE 802.21a. It was felt that the payload will be either encrypted or not; and the proposal should be revised accordingly.

No further discussion is needed, so it was decided to cancel the PM2 slot on Tuesday.

The chair called for a recess until tomorrow AM1 session. Antonio and Daniel will present their proposals in tomorrow session.

### Recess at 6:00PM

## Second Day AM1 Meeting: Lord Byron; Wednesday, January 16

### Meeting called to order by Chair at 8:10AM

Minutes are taken by Karen Randall and Toru Kambayashi.

### Agenda Change

The Chair proposed to cancel the Thursday morning session, so the group would review the closing note at the end of this session. Antonio de la Oliva and Carlos Guimaraes attended via tele-conference (but attendance shall not be maintained for remote participants).

### Proposal DCN 21-13-0015 were presented by Antonio de la Oliva and Daniel Corujo

This presentation was on how to transport multicast and how to modify IEEE 802.21 to use the multicast. The detailed proposals are summarized in DCN 21-13-0003-00 and 21-13-0004-00.

It was proposed that the major required updates are:

1) The command service flow will need to allow multiple responses coming from different multicast clients.

2) The transaction destination and source state machines will need to be modified to differentiate between multicast and broadcast.

Chair asked: what the different behavior is for multicast and broadcast in terms of the state machine? Why is the differentiation necessary?

New primitives will be necessary to join the multicast group. Join primitives should carry information about the transport address to bind to. An extension to the registration procedure will enable the MN to obtain the list of groups while registering with the PoS.

It was noted that the security aspects of this procedure are yet to be defined. It was suggested that the security aspects as described in this proposal is similar in concept as presented by Yoshikazu Hanatani in DCN 21-13-0014. . A new security TLV will be defined that will be for authentication. The proposal will add a new security association type, Authenticated, in addition to TLS-generated and EAP-generated; however which authentication mechanisms to be supported still need to be specified.

Additionally, the Security element INTG\_ BLOCK is added representing integrity-protected data. It is not clear if ENCR\_BLOCK, representing encrypted data, should also be added.

The LINK\_ID data type was reviewed. There was much discussion and concern expressed about why it is necessary to modify the LINK\_ID data type. It was suggested to look at the MIHF\_ID definition in IEEE 802.2-2008 ; perhaps something similar could be used here. It was felt that further discussion is needed to determine what will be specified in this amendment.

The presentation also addressed a proposed way to consider integrating the two solutions and is captured in slide #12 (DCN 21-13-0015). WG Chair suggested that the members of the group consider how to merge the solutions, possibly should be done at the next meeting, March 2013.

It mentioned that the major issues that need to be discussed to merge the two proposal clusters are differences in join procedure, group identifier format and how to support existing primitives and messages.

Chair mentioned that the major issues will be discussed in teleconferences that will be held between January and March meetings.

### Closing Note by Chair

Chair presented Closing Note given in DCN 21-13-0016.

At the next meeting in March, it is anticipated that updated presentations will be reviewed; It was reminded that the submission deadline is March 10. There will be no new proposals accepted. It is the goal to do harmonization and down-selection no later than the May 2013 meeting.

Teleconference schedule was also discussed.

### The meeting was adjourned at 12:25pm

# Future Sessions

* **Plenary: 17-21 March, 2013, Caribe Royale, Orlando, FL, USA** 
  + **Co-located with all 802 groups**
* ***Registration Information:***
* **IEEE 802 Wireless Group HOTEL RESERVATIONS and early bird Deadline** 
  + **CARIBE ROYALE:   $170/Night (plus applicable taxes)\***
  + **BUENA VISTA SUITES:   $150/Night (plus applicable taxes)\***
  + **Early Bird Deadline: 6pm Pacific Time, Friday, January 25, 2013**
* **Early: Before 6pm Pacific Time, Friday, January 25, 2013**

**(UTC Time: 2am Saturday, January 26, 2013)**

* + $500 US for attendees staying at the conference hotels ( $800 US for all others**)**
* **Standard: After Early Registration and before 6pm Pacific Time,**  **March 8, 2013**
  + $600 US for attendees staying at the conference hotels, ($900 US for all others)
* **Late/On-site: After 6pm Pacific Time**  **March 8, 2013**
  + $800 US for attendees staying at the conference hotels, ($1100 US for all others)

# Attendance

|  |  |
| --- | --- |
| Chan Anthony | Huawei Technologies |
| Chaplin Clint | Samsung |
| Golmie Nada | NIST |
| Kambayashi Toru | Toshiba Corporation |
| Yoshikazu Hanatani | Toshiba Corporation |
| Ohba Yoshihiro | Toshiba Corporation |
| Park Hyunho | Electronics and Telecommunications Research Instititute (ETRI) |
| Perkins Charles | Futurewei Technologies |
| Lee Hyeong-Ho | Electronics and Telecommunications Research Instititute (ETRI) |

# The meeting was adjourned at 11:40am