IEEE 802.1 Working Group

7-10 November 2016 Plenary Meeting

San Antonio, TX, USA

Meeting Minutes

The 802.1 Chair, Glenn Parsons, presided.
The 802.1 Recording Secretary, Jessy Rouyer, wrote the minutes in part based on input from 802.1 Task Group Chairs.

1 Attendance and affiliation

Last Name	First Name	Middle Name	Affiliation
Akasaki	Shogo		DENSO
An	Song-Haur		INDEPENDENT
Assmann	Ralf		Marvell Semiconductor, Inc.
Baek	SeoYoung		LG ELECTRONICS
Bao	Shenghua		HUAWEI
Bierschenk	Jens		Robert Bosch GmbH
Bjornstad	Steinar		TransPacket
Bohm	Mark		Microchip Technology, Inc.
Boiger	Christian		b-plus GmbH
Bottorff	Paul		Hewlett-Packard Development Company, L.P.
Braun	Ralf-Peter		Deutsche Telekom AG
Chen	David		Nokia
Chen	Feng		Siemens AG
Cheng	Weiying		Coriant
Cummings	Rodney		National Instruments Corporation
Ellegaard	Lars		Vitesse Semiconductor Corporation
Fang	Yonggang		ZTE TX Inc
Farkas	Janos		Ericsson
Finn	Norman		Self Employed
Fischer	Michael		NXP Semiconductors
Fontaine	Mickael		TransPacket
Garner	Geoffrey		Broadcom Corporation
Gilb	James		Tensorcom, Inc.
Gravel	Mark		Hewlett-Packard Development Company, L.P.
Grigat	Michael		Deutsche Telekom AG
Gunther	Craig		HARMAN INTERNATIONAL INDUSTRIES, INCORPORATED
Gutierrez	Marina		TTTech Computertechnik AG
Haddock	Stephen		Stephen Haddock Consulting, LLC

Hantel	Mark	Rockwell Automation
Heffernan	Patrick	Spirent Communications
Holness	Marc	Ciena Corporation
Huang	Jing	Huawei Technologies Co., Ltd
Hung	Soar	Realtek Semiconductor Corp.
Jeffree	Anthony	HP, Adva
Jeffries	Timothy	Huawei R&D USA
Jin	Liang	Spirent Communications
Kehrer	Stephan	Hirschmann Automation and Control, Inc.
kim	ajung	sejong
Kim	Youn-Kwan	The Catholic University of Korea
Klaus	Andrew	JASAPAR; Marvell Semiconductor, Inc.
Korhonen	Jouni	Broadcom Corporation
Krieger	Ann	US Department of Defense
Lansford	James	Qualcomm Incorporated
Lee	Hyeong Ho	Electronics and Telecommunications Research Institute (ETRI)
Lepp	James	BlackBerry
Levy	Joseph	InterDigital, Inc.
Li	Yizhou	Huawei Technologies Co. Ltd
Mangin	Christophe	Mitsubishi Electric R&D Centre Europe (MERCE)
Marks	Roger	EthAirNet Associates
McIntosh	James	Microsemi Corporation
Messenger	John	ADVA Optical Networking Ltd.
Moskowitz	Robert	HTT Consultant
Mustala	Tero	Nokia Networks
Muyshondt	Henry	Microchip Technology, Inc.
Pandey	Sujan	NXP Semiconductors
Pannell	Donald R	Marvell Semiconductor, Inc.
Parsons	Glenn	Ericsson AB
Persson	Hakan	Ericsson AB
Petrie	Richard	DisplayLink (UK) Ltd
Pienciak	Walter	IEEE
Potts	Michael	General Motors Company
Randall	Karen	NSA/IAD
Riegel	Maximilian	Nokia Networks
Rouyer	Jessy	Nokia
Ryytty	Eero	Nokia
Sato	Atsushi	Yokogawa Electric Corporation
Schewe	Frank	Phoenix Contact
Seaman	Michael	Individual
Slaats	Patrick	IEEE-SA
Specht	Johannes	University of Duisburg-Essen and General Motors Company

Thaler	Patricia	Broadcom Limited
Ting	Ao	ZTE Corporation
Unbehagen	Paul	Avaya Inc.
Wang	Hao	Fujitsu Research & Development Center
Wang	Lei	Marvell Semiconductor, Inc.
Wang	Xinyuan	Huawei Technologies Co. Ltd
Weis	Brian	Cisco Systems, Inc.
Woods	Jordon	Innovasic, Inc.
Zein	Nader	NEC Corporation
Zinner	Helge	Continental Automotive Systems AG
Zuniga	Juan Carlos	SIGFOX

2 Opening Plenary Meeting

Call to order: 7 November 2016, 10:30 AM.

The 802.1 Chair, Glenn Parsons, presided.
The 802.1 Recording Secretary, Jessy Rouyer, wrote the minutes.

The Chair presented the *Opening Agenda* slides available at
http://www.ieee802.org/1/files/public/minutes/2016-11-opening-plenary-slides.pdf.

During this presentation, the Chair:
- Showed slides 3 through 8 (reproducing slides 0 through 4 of the IEEE-SA PatCom Patent
  Slides for Standards Development Meetings, separately available at
  http://standards.ieee.org/about/sasb/patcom/materials.html).
  The Chair:
  o Presented information on these slides, which included:
    ▪ Instructions for the WG Chair (and TG Chairs);
    ▪ Participants, Patents and Duty to Inform;
    ▪ Patent Related Links;
    ▪ Call for Potentially Essential Patents; and
    ▪ Other Guidelines for IEEE WG Meetings.
  o Advised WG attendees that:
    ▪ The IEEE's patent policy is described in Clause 6 of the IEEE-SA Standards Board
      Bylaws;
    ▪ Early identification of patent claims which may be essential for the use of standards
      under development is strongly encouraged;
    ▪ There may be Essential Patent Claims of which the IEEE is not aware. Additionally,
      neither the IEEE, the WG, nor the WG chair can ensure the accuracy or
      completeness of any assurance or whether any such assurance is, in fact, of a
      Patent Claim that is essential for the use of the standard under development.
  o Made the "Call for Potentially Essential Patents" thereby providing an opportunity for
    participants to identify patent claim(s)/patent application claim(s) and/or the holder of
    patent claim(s)/patent application claim(s) of which the participant is personally aware
    and that may be essential for the use of that standard.
    There were no responses to the call.
  o Reminded the 802.1 TG Chairs of their daily obligations (per slide 8) with respect to
    presenting the IEEE-SA PatCom Patent Slides for Standards Development Meetings
    and making the "Call for Potentially Essential Patents".

- Reviewed general administrative information including:
  - Meeting "Decorum" or rules, including the policies on public reporting, and on photography or recording (slide 9);
  - Hotel and meeting room security (slide 10);
  - General information on 802.1 (slide 11), including information on 802.1 operation available at http://www.ieee802.org/1/files/public/minutes/802-1-general-info-v3.pdf, a reminder that contributions are to be uploaded before presentation, how to access meeting schedule, and how to report meeting session attendance;
    - The Chair also noted an orientation session was to be held Monday 7 November 2016 evening:
  - Meeting logistics (slide 12).
- Introduced 802.1 Officers and provided 802.1 website information (slide 13).
- Reviewed the list of 802.1 voting members, including information about individuals who have lost, may lose or may gain 802.1 voting membership, and reminded individual participants of their duties to vote as instructed in 802.1 ballots and to record their attendance to the meeting via IMAT to enable accurate maintenance of 802.1 voting membership (slides 14-19). The Chair indicated 25 voters were in peril of losing their voting membership due to failure to vote in previous ballots. The Chair reminded individual participants about 802.11 reciprocal credit, which was continued at this meeting (slide 20).
- Provided administrative information about file upload and the need to upload using the provided URL prior to presenting (slide 21).
- Thanked János Farkas for giving the 802.1 newcomer orientation session on Monday 7 November 2016 6:30 PM (slide 22).
  - János Farkas provided an indication of the updates made to the material to be presented at this time.
    - During this orientation session, held 06:30-08:00 PM, János Farkas presented *Introduction to 802.1 Focus on the Time-Sensitive Networking Task Group*: http://ieee802.org/1/files/public/docs2016/tsn-farkas-intro-1116-v01.pdf (updated as http://www.ieee802.org/1/files/public/docs2016/tsn-farkas-intro-1116-v02.pdf).
- Reviewed the schedule for future interim meetings (slide 23), which included:
  - 16-19 January 2017 in Atlanta, GA, USA (sponsored by 802).
  - 15-18 May 2017 meeting in Stuttgart, Germany.
    - Stephan Kehrer provided an oral update.
  - 11-15 September 2017 in Waikoloa Village, Hawaii, USA (with 802.11) or in Newfoundland, Canada
  - May 2018 (dates and location to be defined) hosted by Ethernet Alliance.
    - John D'Ambrosia presented *OFFER TO HOST IEEE 802.1/802.3 Joint Interim Meeting May 2018, Dates TBD North America, Location TBD*: http://ieee802.org/1/files/public/docs2016/admin-dambrosia-may-2018-offer-v1.pdf, indicating he would present the same proposal to 802.3 on Thursday 10 November 2016. This offer was well received by 802.1
  - January 2018 in Irvine, CA (with 802.11) and September 2018 in either Waikoloa Village, Hawaii, USA (with 802.11) or in Newfoundland, Canada are options.
    - The Chair conducted Straw Polls on:
      - "If we had a meeting in Waikoloa in September 2017, who would go?": 26
      - "If we had a meeting in Newfoundland in September 2017, who would go?": 27
  - No leads for the rest of 2018.

- Reported the following items out of the 802 EC executive session (slide 24):
  - 802.17 WG disbanded
    - Standard withdrawn
  - 802 Task Force
    - Fellowship program – regulators & technical
    - Indemnification
    - Tools
  - P&P and CG change proposals ([EC-16-174](#))
    - New slide ([EC-16-180](#)) for all WGs noting relevant P&P
  - Future Venues ([EC-16-177](#))
  - Treasurer
    - Macau Government subsidy - ~$130k
    - Surplus from Singapore now in Macao
  - 802.11 dominance allegation
    - Investigation found none in 802.11ai
      - Non-experts were voting
    - 802.11ax – un-conflicted EC members review on Tuesday
- Provided a list of 802 EC meetings to be held this week (slide 25).
- Provided information about Public Review (slide 26) and indicated no email ballots (ePoll) were conducted since the last plenary (slide 27).
- Pointed out PARs and CSDs that are up for vote at this meeting (slide 28). 802.1 has three for P802c, P802.1AR revision, P802.1CS. 802.3 has one for P802.3cg. 802.11 has one for a P802.11 amendment. 802.19 has one for P802.19.2. The other WGs have until Tuesday 5:00 PM to provide 802.1 with comments that then has until 5:00PM on Wednesday to respond. The Chair noted 802.1 has to comment on other PARs if 802.1 thinks they are relevant to its work. The Chair asked whether there was interest in 802.1 to review any of these; some interest was expressed to potentially review the 802.11 Amendment and P802.19.2. The Chair asked to be notified before meeting start on Tuesday 8 November 2016 if anyone thought that 802.1 should review.
- Indicated there would be no tutorial this week (slide 29).
- Reviewed the list of liaisons within 802 (joint and standing committee meetings, 802 task force) to be held this week (slide 30), led discussions of some of the incoming liaisons also allocating them to 802.1 TGs for further discussion and processing (slide 31).
  - Regarding mention on slide 33 of the Deterministic Ethernet Conference, Craig Gunther presented *Deterministic Ethernet Forum 2017 (April 27-28 Vienna,Austria) A co-hosting opportunity for the IEEE 802.1 Working Group*: http://www.ieee802.org/1/files/public/docs2016/admin-cgunther-DE-Forum-2017-1116-v02.pdf. The embedded proposal to co-host was well received.
- Provided his anticipation of next actions with respect to projects in the current WG's work load asking editors to review for correctness (slide 32) and discussed the promotion of the work the WG is doing (slide 33).
- Asked editors of the projects listed at the bottom of slide 34 to nominate future Standards Project Awards recipients (slide 34).
- Provided TG Chairs with guidance regarding the preparation of the motions for this week's closing plenary meeting, and requested to be provided with EC required supporting material (PAR to NesCom, drafts to Sponsor ballot, drafts to RevCom) before these motions are considered (slide 35).
- Showed the 802.1 plenary schedule/agenda for this meeting, which was tacitly approved (slide 36).

- Requested the 802.1 TG Chairs to introduce their TG agenda (slide 37):
  - Mick Seaman presented the Security TG agenda (slide 38).
  - János Farkas presented the TSN TG agenda (slide 39).
  - Maximilian Riegel presented the OmniRAN TG agenda (slides 40 and 41).
  - John Messenger presented the Maintenance TG agenda for 8 Nov. 2016 (slide 42).
  - Patricia Thaler presented the DCB TG agenda for 26 July 2016 (slide 43).

There was no other business to discuss (slide 44) and the opening plenary meeting was adjourned at 12:49 PM.

3 Task Group Meetings

3.1 Data Center Bridging

The Data Center Bridging (DCB) Task Group Chair, Patricia Thaler, presided.
Paul Bottorff wrote the minutes.

At the beginning of the meetings on Tuesday, and Wednesday, Patricia Thaler presented the IEEE-SA PatCom Patent Slides for Standards Development Meetings, and made the "Call for Potentially Essential Patents". There were no responses to the calls prior to the end of the week's sessions.

Tuesday 8 November 2016 10:30 AM-12:15 PM
Call to order: 8 November 2016, 10:30 AM

Patricia Thaler presented the following agenda for the meeting:
- P802c comment resolution
- P802.1Qcn
- P802.1CQ
- Presentation on IETF I-D on higher layer QCN (quantized congestion notification), to adjournment

This agenda was approved.

Roger B Marks, P802c editor, led the resolution of comments received in the WG ballot on http://ieee802.org/1/files/private/802-c-drafts/d1/802c-d1-2.pdf:
http://www.ieee802.org/1/files/private/802-c-drafts/d1/802c-d1-2-dis-r1.pdf
- Plan to send out 10-day recirculation ballot on draft 2.0 on 8 December 2016
- Plan to start Sponsor Ballot in January 2017, unless additional recirculation ballot is required

Tuesday 8 November 2016 4:00 PM-5:00 PM
Call to order: 8 November 2016, 4:00 PM

Paul Bottorff presented *Terminology 802.1Qcn*
http://www.ieee802.org/1/files/public/docs2017/cn-bottorff-terminology-1116-v01.pdf discussing terminology difference between EVB and NVO3 and impact on P802.1Qcn.
- It was concluded that the TG will use the terms VSI as equivalent to TSI, and DRP as equivalent to VAP, will not change EVB terminology, however will add a section providing explaining the VDP in IETF terms.
- Paul Bottorff agreed to draft the introduction to VDP for NVO3 and to include it in an updated P802.1Qcn draft.

The TG discussed drafting a short presentation in IETF NVO3 to update them on status of the P802.1Qcn draft (the presentation that resulted from the discussion is at: https://www.ietf.org/proceedings/97/slides/slides-97-nvo3-sessb-ieee-8021qcn-vdp-extension-for-nvo3-status-update-00.pdf) and how to provide the P802.1Qcn draft to IETF for review.
- Short discussion on the ambiguity of the terms QCN vs Qcn and how they mean completely different things.

It was noted the TG's agenda would open on Wednesday 9 November 2016 with a proposal to use QCN at layer 3.

Wednesday 9 November 2016 8:30 PM-2:00 PM
Call to order: 9 November 2016, 8:30 PM

Yolanda Yu presented *New Requirements of CN (802.1Qau)*
http://www.ieee802.org/1/files/public/docs2016/au-yolanda-l3qcn-1116-v00.pdf
- Yolanda Yu proposed using QCN protocol over a UDP as an L3 protocol
- Discussion about the problems caused by encapsulations, BECN and fairness

Ting Ao presented *Proposal for the MAC address assignment protocol*
http://www.ieee802.org/1/files/public/docs2016/cq-ao-local-address-assignment-1116-v00.pptx
on Local MAC address assignment protocol for 802.1CQ
- Discussion on Bridge ID assignment, scope of local addresses, use of MACs for forwarding

Patricia Thaler presented http://www.ieee802.org/1/files/public/docs2016/cq-thaler-objectives-1116.pdf on 802.1CQ objectives
- Discussion on peer vs. server based assignments under a unified protocol, timing considerations, and security considerations

Motions reflecting DCB Task Group conclusions were prepared for the 802.1 closing plenary and can be found in their final form following slide 55 in http://www.ieee802.org/1/files/public/minutes/2016-11-closing-plenary-slides.pdf.

3.2 Maintenance

The Maintenance Task Group minutes are incorporated in these minutes by reference and are available at http://ieee802.org/1/files/public/maint/2016-11-maintenance-meeting-v2.pdf.

Motions reflecting Maintenance Task Group conclusions were prepared for the 802.1 closing plenary and can be found in their final form following slide 67 in http://www.ieee802.org/1/files/public/minutes/2016-11-closing-plenary-slides.pdf.

3.3 OmniRAN

OmniRAN Task Group meeting minutes are incorporated into these minutes by reference and are available at https://mentor.ieee.org/omniran/dcn/16/omniran-16-0090-00-00TG-nov-2016-f2f-meeting-minutes.docx.

Current status of OmniRAN Task Group activities (including future meeting announcements, past meeting and conference call minutes) is available via a wiki located at https://mentor.ieee.org/omniran/bp/StartPage.

Motions reflecting OmniRAN Task Group conclusions were prepared for the 802.1 closing

plenary and can be found in their final form following slide 64 in
http://www.ieee802.org/1/files/public/minutes/2016-11-closing-plenary-slides.pdf.

3.4 Security

Call to order: 7 November 2016 01:30 PM. The Security Task Group met in the afternoon Monday 7 November 2016, all day Tuesday 8 November 2016, and all day Wednesday 9 November 2016.

The Security Task Group Chair, Mick Seaman presided and wrote the minutes.

At the beginning of the meetings on Monday, and Wednesday, Mick Seaman presented the IEEE-SA PatCom Patent Slides for Standards Development Meetings, and made the "Call for Potentially Essential Patents". Tuesday's meetings began with the chair of the Maintenance Task Group presenting the IEEE-SA PatCom Patent Slides for Standards Development Meetings, and making the "Call for Potentially Essential Patents". There were no responses to the calls prior to the end of the week's sessions.

Mick Seaman proposed the following agenda (as discussed in the 802.1 opening plenary, detail with document links: http://www.ieee802.org/1/files/public/docs2016/security-seaman-agenda-1116-v0.pdf) for the Security Task Group meeting week:
1. P802.1AEcg (*MAC Security: Ethernet Data Encryption Devices*)
    1.1. Sponsor Ballot Resolution
2. P802.1Xck (*Port-Based Network Access Control: YANG Data Model*)
    2.1. P802.1Xck D0.8 Task Group Ballot resolution
3. P802.1ARce (*Secure Device Identity: SHA-384 and P-384 Elliptic Curve*)
    3.1. P802.1ARce D1.1 Task Group Ballot Resolution
    3.2. Respond to other WG comments on Rev PAR (pre-circulated)
4. P802E Privacy (*Recommended Practice for Privacy Considerations for IEEE 802 Technologies*)
5. A.O.B
    5.1. MACsec in automotive applications
6. Further meetings/teleconferences

This agenda was approved.

Minutes of the discussion of each of the agenda items (above) in the Security Task Group, follow.

1. P802.1AEcg (MAC Security: Ethernet Data Encryption devices)

1.1. Sponsor Ballot Resolution

The P802.1AEcg Sponsor Ballot of http://www.ieee802.org/files/private/cg-drafts/d1/802-1AEcg-d1-4.pdf had passed and Mick Seaman, P802.1AEcg editor, had prepared a proposed disposition of comments (http://www.ieee802.org/1/files/private/cg-drafts/d1/802-1AEcg-d1-4-sponsor-ballot-pdis0.pdf), and a proposed draft (http://www.ieee802.org/1/files/private/cg-drafts/d1/802-1AEcg-d1-5.pdf) showing their resolution that had been shared with voters providing comments.
These were discussed and agreed (no change apart from removing PROPOSED from each Remedy). Since the ballot had passed the scope of the recirculation will be limited to the issues raised in comments made on the initial ballot and changes to the draft. After producing draft 1.5, the editor had received confirmation from Glenn Parsons, 802.1 chair, that the RAC had assigned the requested "-1F" EDE-CC PEP Address. A further draft 1.6 for Sponsor

recirculation ballot, identical to draft 1.5 except for the substitution of this address for the "tba" entries, was posted in the cg-drafts directory (subsequently renamed to show it as the sponsor ballot draft):
http://www.ieee802.org/1/files/private/cg-drafts/d1/802-1AEcg-d1-6-sponsor-recirc.pdf
[Post-meeting note – The sponsor recirculation ballot opened 18 November 2016, with the above draft and disposition, and concluded 28 November 2016 with no further comments or change in the tally of votes.]

2. P802.1Xck (Port-Based Network Access Control: YANG Data Model)

2.1. Task Group Ballot Resolution

Marc Holness, P802.1Xck editor, led the resolution of comments received in the TG ballot on http://www.ieee802.org/1/files/private/ck-drafts/d0/802-1Xck-d0-8.pdf.

A proposed disposition of comments, revised during the course of the meeting, was posted at: http://www.ieee802.org/1/files/private/ck-drafts/d0/802-1Xck-d0-8-pdis-v02.pdf.
A further draft (not incorporating all comment resolutions) was posted during the meeting: http://www.ieee802.org/1/files/private/ck-drafts/d0/802-1Xck-d0-9.pdf.
It was agreed that a further draft incorporating the comment resolutions would be for WG ballot.
[Post-meeting note – The WG ballot of draft 1.0 started 9 December 2016, to close 15 February 2016. A final disposition of comments on draft 0.8 has also been posted.]

3. P802.1ARce (Secure Device Identity: SHA-384 and P-384 Elliptic Curve)

3.1. Task Group Ballot Resolution

Mick Seaman, P802.1Arce editor, had added to draft 1.1 (http://www.ieee802.org/1/files/private/ce-drafts/d1/802-1ARce-d1-1.pdf) the MIB and other points raised during the September interim and had submitted draft 1.1 for Task Group ballot prior to this meeting.
Discussion of the ballot comments is now recorded in http://www.ieee802.org/1/files/private/ce-drafts/d1/802-1ARce-d1-1-dis.pdf with the accompanying changes now in http://www.ieee802.org/1/files/private/ce-drafts/d1/802-1ARce-d1-2.pdf.
There was also some discussion of the issue raised in draft 1.0 annex Z.1 (protecting an LDevID to be inserted into the DevID module) with references suggested to be taken into account.
[Post-meeting note – Draft 1.2 contains the editor's proposed resolution of the issue in Annex Z.1. Annex Z.1 itself has been updated with further suggestions for change, but the editor now suggests that they be dropped bearing in mind the prohibition in SP800-56A concerning multiple uses of a single key used for key agreement. The issues involved are documented in the revised annex Z.1 and were reviewed in the 8 December 2016 Security TG teleconference.]

3.2. Proposed P802.AR-Rev PAR

Glenn Parsons, 802.1 chair, had pre-circulated to 802.0 on 5 October 2016 the revisions to the proposed PAR and CSD:
  a. http://www.ieee802.org/1/files/public/docs2016/ar-seaman-rev-draft-par-0916-v02.pdf
  b. http://www.ieee802.org/1/files/public/docs2016/ar-seaman-rev-draft-csd-0916-v02.pdf
No comments on the proposed PAR were received from other working groups and the 802.1 closing plenary voted to request 802.0 approval to forward the proposed PAR to RevCom and for WG ballot of P802.1AR-Rev (based on the P802.1ARce draft) once that PAR had been approved.

4. P802E (Recommended Practice for Privacy Considerations for IEEE 802 Technologies)

Jerome Henry, P802E editor, was unable to attend this meeting. Further discussion of the draft is planned to occur during the January 2017 802.1 interim meeting. Task group members attended an 802.11 session in which Mathieu Cunche presented https://mentor.ieee.org/802.11/dcn/16/11-16-1492-00-0wng-privacy-issues-in-802-11-networks.pptx.

This presentation incorporated a number of the points Mathieu had previously shared with the Security TG in P802E teleconferences and documented in a prior paper on wireless fingerprinting. At the conclusion of his presentation a straw poll was conducted on the question "Do you think 802.11 specifications should include privacy recommendations about the usage of its protocols and parameters?", resulting in Yes 37, No 12, and Abstain 57. It appeared that the extent of the Abstain vote reflected skepticism that all the fingerprinting opportunities could be effectively addressed (and did not necessarily indicate indifference to the privacy issue).

5. A.O.B.

5.1. MACsec in automotive applications

There was a further brief discussion of the potential use of MACsec in automotive applications, but no substantive further input and no attempt to reach conclusions. Several of the discussion participants said that they might be able to provide input to the March 2017 meeting (they planned to attend the January 802.3 interim meeting which is not collocated with the 802.1/802.11/802.15 interim). Among points noted in the discussion were:
a. Full redundancy is currently rare – with a 'limp home' capability being provided for some functions;
b. It would be consistent with some past practice to require physical relocation of a vehicle prior to repair;
c. An 'end-to-end' or 'multi-hop' MACsec use might be used with an intervening hop to address the 'trailer hitch' exposure issue (that would be consistent with the 802.1AEcg approach of a single hop traversing a provider network); and
d. There was currently a fairly wide variation in network topology, with rings not as widely used as some had thought and with a fairly small network diameter (typically 4).

6. Future meeting/teleconference planning

Teleconferences had already been scheduled for 8 December 2016 and 11 January 2017 at 1:00 PM Pacific Time.

The Security Task Group will meet during the January 2017 802.1 interim in Atlanta, Georgia, USA.

Motions

Motions reflecting Security Task Group conclusions were prepared for the 802.1 closing plenary and can be found in their final form following slide 48 in http://www.ieee802.org/1/files/public/minutes/2016-11-closing-plenary-slides.pdf.

3.5 Time-Sensitive Networking

The Time-Sensitive Networking (TSN) Task Group Chair, János Farkas presided and Rodney Cummings wrote the minutes.

At the beginning of the meetings on Monday, Tuesday, Wednesday, and Thursday, János Farkas presented the IEEE-SA PatCom Patent Slides for Standards Development Meetings, and made the "Call for Potentially Essential Patents". There were no responses to the calls

prior to the end of the week's sessions.

Monday 7 November 2016 08:00 AM-08:00 PM
Call to order: 7 November 2016, 08:00 AM

János Farkas presented the agenda for the TSN Task Group meeting week:
http://www.ieee802.org/1/files/public/docs2016/admin-tsn-agenda-1116-v00.pdf.
This agenda was approved.

Rodney Cummings presented *802.1AS-Rev: Data Set Enhancements*:
http://www.ieee802.org/1/files/public/docs2016/as-cummings-data-set-enhancements-1116-v00.pdf.

Geoff Garner, P802.1AS-Rev editor, led the resolution of comments received in the TG ballot on http://www.ieee802.org/1/files/private/as-rev-drafts/d4/802-1AS-rev-d4-2.pdf:
http://www.ieee802.org/1/files/private/as-rev-drafts/d4/802-1AS-rev-d4-2-pdis.pdf
http://ieee802.org/1/files/public/docs2016/as-garner-text-for-as-rev-7-2-4-1116-v01.pdf

Tuesday 8 November 2016 10:30 AM-06:00 PM
Call to order: 8 November 2016, 10:30 AM

Marc Holness, P802.1Qcp editor, led the resolution of comments received in the TG ballot on http://www.ieee802.org/1/files/private/cp-drafts/d0/802-1Qcp-d0-6.pdf:
http://www.ieee802.org/1/files/private/cp-drafts/d0/802-1Qcp-d0-6-pdis-v01.pdf

Tony Jeffree, P802d editor, led the resolution of comments received in the Sponsor recirculation ballot on http://www.ieee802.org/1/files/private/802-d-drafts/d1/802d-d1-1.pdf:
http://ieee802.org/1/files/private/802-d-drafts/d1/802d-D1-1-pdis.pdf

Jordon Woods presented *Avnu Industrial's Use of Cut-through and Request for Guidance*:
http://www.ieee802.org/1/files/public/docs2016/liaison-woods-Avnurequest-1116-v00.pdf

Rodney Cummings, P802.1Qcc editor, presented *802.1Qcc D1.1: Intro for Comment Resolution (*http://ieee802.org/1/files/public/docs2016/cc-cummings-d11-comments-intro-1116-v1.pdf) then led the resolution of comments received in the WG ballot on http://www.ieee802.org/1/files/private/cc-drafts/d1/802-1Qcc-d1-1.pdf:
http://ieee802.org/1/files/private/cc-drafts/d1/802-1Qcc-d1-1-pdis-v1.pdf

Christian Boiger presented *Cut-Through and Qcc Bridge Delay Model*:
http://ieee802.org/1/files/public/docs2016/cc-boiger-cut-through-qcc-bridge-delay-model-1116-v01.pdf, updated post-discussion as http://www.ieee802.org/1/files/public/docs2016/cc-boiger-cut-through-qcc-bridge-delay-model-1116-v02.pdf

Wednesday 9 November 2016 08:00 AM-06:00 PM
Call to order: 9 November 2016, 08:00 AM

Feng Chen led the resolution of comments (www.ieee802.org/1/files/public/docs2016/cs-PAR-CSD-comments-and-resolution-1116-v01.ppt) received on the draft PAR (http://www.ieee802.org/1/files/public/docs2016/cs-LRP-draft-PAR-0916-v03.pdf) and CSD (http://www.ieee802.org/1/files/public/docs2016/cs-LRP-draft-CSD-0916-v03.pdf) for P802.1CS:
   a. Answers to received comments: http://www.ieee802.org/1/files/public/docs2016/cs-

PAR-CSD-comments-and-resolution-1116-v02.pdf
   b. Updated PAR: http://www.ieee802.org/1/files/public/docs2016/cs-LRP-PAR-1116-v01.pdf
   c. Updated CSD: http://www.ieee802.org/1/files/public/docs2016/cs-LRP-CSD-1116-v01.pdf

Tony Jeffree led the resolution of comments received in the Sponsor ballot for P802Qci on http://www.ieee802.org/1/files/private/ci-drafts/d2/802-1Qci-d2-0.pdf: http://www.ieee802.org/1/files/private/ci-drafts/d2/802-1Qci-D2-0-dis.pdf

Tony Jeffree led the resolution of a comment received in the WG recirculation ballot for P802.1Qch on http://www.ieee802.org/1/files/private/ch-drafts/d1/802-1Qch-d1-1.pdf: http://ieee802.org/1/files/private/ch-drafts/d1/802-1Qch-D1-1-dis-V2.pdf

Tony Jeffree led the resolution of comments received in the Sponsor recirculation ballot for P802d on http://ieee802.org/1/files/private/802-d-drafts/d1/802d-d1-1.pdf: http://ieee802.org/1/files/private/802-d-drafts/d1/802d-D1-1-pdis.pdf

Norman Finn led the resolution of comments received in the Sponsor ballot for P802.1CB on http://www.ieee802.org/1/files/private/cb-drafts/d2/802-1CB-d2-6.pdf: http://ieee802.org/1/files/private/cb-drafts/d2/802-1CB-D2-6-dis.pdf

János Farkas presented http://www.ieee802.org/1/files/public/docs2016/cm-farkas-editor-report-d0-5-1116-v01.pdf then led the resolution of comments received in the TG ballot for P802.1CM on http://www.ieee802.org/1/files/private/cm-drafts/d0/802-1CM-d0-5.pdf: http://ieee802.org/1/files/private/cm-drafts/d0/802-1CM-d0-5-pdis-v01.pdf

A follow-up session to a July 2016 meeting of the TSN TG with 802.24 was held at 5:00PM. Tim Godfrey presented slides 27 through 31 of https://mentor.ieee.org/802.24/dcn/16/24-16-0034-01-0000-november-2016-meeting-presentation.pptx. These slides were uploaded separately for 802.1 as http://www.ieee802.org/1/files/public/docs2016/new-godfrey-tsn-utility-applications-1116-v01.pdf. The Mentor presentation was updated after presentation in https://mentor.ieee.org/802.24/dcn/16/24-16-0034-02-0000-november-2016-meeting-presentation.pptx to reflect action items on slide 31. This session was adjourned at 5:18 PM.

Thursday 10 November 2016 08:00 AM-12:30 PM
Call to order: 10 November 2016, 08:00 AM

János Farkas led the review of TSN motions, which can be found in their final form following slide 29 in http://www.ieee802.org/1/files/public/minutes/2016-11-closing-plenary-slides.pdf

János Farkas led the review of a draft liaison response to http://www.ieee802.org/1/files/public/docs2016/liaison-SG15-LS378-802.1CM-1016.zip: http://www.ieee802.org/1/files/public/docs2016/liaison-response-ITU-T-SG15-LS378-1116-v01.pdf

János Farkas led the review of a draft liaison response to http://www.ieee802.org/1/files/public/docs2016/liaison-SG15-LS382-CPRI-OTN-1016.docx: http://www.ieee802.org/1/files/public/docs2016/liaison-response-ITU-T-SG15-LS382-1116-v01.pdf

János Farkas led the review of a draft liaison on P802.1CM to MEF Forum:
http://www.ieee802.org/1/files/public/docs2016/liaison-MEF-CM-1116-v01.pdf

Jordon Woods presented *Avnu Industrial's Use of Cut-through and Request for Guidance*:
http://www.ieee802.org/1/files/public/docs2016/liaison-woods-Avnurequest-1116-v00.pdf
János Farkas led the review of the draft liaison response to AVnu:
http://www.ieee802.org/1/files/public/docs2016/liaison-response-avnu-1116-v01.pdf

Jessy Rouyer led the review of a draft liaison on YANG to BBF
http://www.ieee802.org/1/files/public/docs2016/liaison-BBF-YANG-1116-v01.pdf

Jessy Rouyer led the review of a draft liaison on YANG to ONF:
http://www.ieee802.org/1/files/public/docs2016/liaison-ONF-YANG-1116-v01.pdf

Johannes Specht presented *802.1Qcr Updates*:
http://ieee802.org/1/files/public/docs2016/Qcr-specht-editing-1116-v01.pdf

James Gilb presented *Amendment to 802.1AC to include 802.15.3 MAC Entity*:
https://mentor.ieee.org/802.15/dcn/16/15-16-0842-00-003m-802-1ac-amendment-for-802-15-3.pdf

Rodney Cummings led the further resolution of comments received in the WG ballot on
http://www.ieee802.org/1/files/private/cc-drafts/d1/802-1Qcc-d1-1.pdf:
http://ieee802.org/1/files/private/cc-drafts/d1/802-1Qcc-d1-1-pdis-v3.pdf

Motions
Motions reflecting TSN Task Group conclusions were prepared for the 802.1 closing plenary and can be found in their final form following slide 29 in
http://www.ieee802.org/1/files/public/minutes/2016-11-closing-plenary-slides.pdf.

4 Closing Plenary Meeting

Call to order: 10 November 2016, 1:34 PM.

The 802.1 Chair, Glenn Parsons, presided.
The 802.1 Recording Secretary, Jessy Rouyer, wrote the minutes.

The Chair presented the *802.1 Closing Plenary* slides available at
http://www.ieee802.org/1/files/public/minutes/2016-11-closing-plenary-slides.pdf.
Details comprising motion text, proposer, seconder, numbers of 802.1 voting members for, against or abstaining on all motions moved during this closing plenary meeting are available in these slides. Motions are otherwise summarized in this section.

During this presentation, the Chair:
- Showed the agenda on slide 3, which was approved.
- Showed slides 4 through 8 (reproducing slides 0 through 4 of the IEEE-SA PatCom Patent Slides for Standards Development Meetings, separately available at http://standards.ieee.org/about/sasb/patcom/materials.html):
  o The Chair made the "Call for Potentially Essential Patents". There were no responses to the call.
- Showed the 802.1 Officers (slide 9).
- Reviewed the list of 802.1 voting members, including information about individuals who

have lost, have gained or may have gained 802.1 voting membership at this meeting as well as three individuals having relinquished their voting member status (slides 10 through 15).

- Reviewed the schedule for future 802.1 interim meetings (slide 16) and plenary meetings (slide 18). The latter remained unchanged from the 7 November 2016 802.1 opening plenary except for a new lead for September 2017; January 2018 remained open:
  o Stephan Kehrer presented *IEEE 802.1 Interim meeting proposal Stuttgart, Germany May 15.-18. (Mon – Thu), 2017*: http://www.ieee802.org/1/files/public/docs2016/admin-kehrer-Stuttgart-interim-1116-v01.pdf.
  o Details of the 802.11 proposal for September 2017 are available on the 802.11 website.
  o The Chair presented on *St. John's Newfoundland Canada* (http://www.ieee802.org/1/files/public/docs2016/admin-parsons-nfld-proposal-1116.pdf) then conducted Straw Polls (slide 17) on:
    ▪ "Who would attend 802.11 or 802.3 if we do not meet with them?": 2
    ▪ "Week choice for Sept 2017"
      • "Sept 4th": 21
      • "Sept 11th": 22
      • "Sept 18th": 21
      • "Sept 25th": 20
    ▪ "Who would prefer Sept 2017 interim in Hawaii or Newfoundland?":
      • Hawaii 10, Newfoundland 19
    ▪ The Chair indicated he would pick the week for Newfoundland.
  o The Chair indicated 802.1 will meet in the Fairmont Vancouver (not in the Hyatt Regency Vancouver) in March 2017.
- Reviewed the current WG's work load: 24 active projects, including in-progress PARs (slide 19).
- Requested presentations of the reports on 802 Standing Committees (slide 20):
  o Patricia Thaler reported on the IETF SC: https://mentor.ieee.org/802-ec/dcn/16/ec-16-0185-00-00EC-ec-ietf-standing-committee-opening-report.pdf
  o John Messenger reported on the JTC1 SC: https://mentor.ieee.org/802.11/dcn/16/11-16-1299-03-0jtc-ieee-802-jtc1-sc-agenda-for-nov-2016.pptx
  o The Chair reported on the ITU SC: https://mentor.ieee.org/802-ec/dcn/16/ec-16-0187-00-INTL-itu-standing-committee-agenda-nov-2016.pdf
- Presented the report on the 802 Task Force (slide 21), including indemnification of volunteer officers/editors, IEEE copyright for IETF works, myProject replacement, website and IEEE-SA staff support (program: Jonathan Goldberg & Kathryn Bennett, editors: Michelle Turner & Catherine Berger, international: Jodi Haasz). Additionally:
  o Paul Unbehagen gave an oral update regarding progress in updating the 802.1 website.
  o The Chair gave an oral update on P802.1Q-REV going forward and took action to inform staff editors of 802.1 editors' desire for diagrams to remain searchable.
- Requested the 802.1 TG Chairs to provide reports on the activities of their TGs (slide 22; see individual TG minutes above for details):
  o Mick Seaman summarized Security TG progress.
  o Patricia Thaler summarized DCB TG progress.
  o János Farkas summarized TSN TG progress.
  o Maximilian Riegel summarized OmniRAN TG progress.
  o John Messenger summarized Maintenance TG progress.
- Led the review of outgoing liaisons (slide 23):
  o Janos Farkas presented the draft outgoing liaisons on P802.1CM and that to AVnu.
  o Jessy Rouyer presented the draft outgoing liaisons on YANG to BBF and ONF.
- Craig Gunther presented the proposed press release on IEEE Std 802.1Qbz.

- Conducted votes on the following motions that passed (unless otherwise indicated):
  - Administrative motions:
    - 802.1 approves the July 2016 (Plenary) and September 2016 (Interim) minutes:
      http://ieee802.org/1/files/public/minutes/2016-07-minutes.pdf
      http://ieee802.org/1/files/public/minutes/2016-09-minutes.pdf
      Proposed: Jessy Rouyer   Seconded: John Messenger
      Approved by Acclamation
    - 802.1 approves to hold it May 2018 interim in a location to be hosted by the Ethernet Alliance
      http://www.ieee802.org/1/files/public/docs2016/admin-dambrosia-may-2018-offer-v1.pdf
      Proposed: Craig Gunther   Seconded: Don Pannell
      Approved by Acclamation
    - 802.1 approves to hold an interim September 5-8, 2017 interim in St. John's, Newfoundland
      http://www.ieee802.org/1/files/public/docs2016/admin-parsons-nfld-proposal-1116.pdf
      Proposed: Norm Finn   Seconded: Craig Gunther
      Approved by Acclamation
  - TSN motions:
    - Conditionally approve sending P802.1Qci to RevCom.
      Confirm the PAR for P802.1Qci in: https://development.standards.ieee.org/get-file/P802.1Qci.pdf?t=86069100003
      Confirm the CSD for P802.1Qci in
      http://www.ieee802.org/1/files/public/docs2015/new-nfinn-input- gates-csd-0115-v03.pdf
      P802.1Qci-D2.0 had 96% approval at the end of the last sponsor recirculation ballot.
      See http://www.ieee802.org/1/files/public/Exec_files/P802-1Qci-D2-0-required-comments.pdf for supporting documentation
      In the WG (y/n/a): 27, 0, 0
      Proposed: Tony Jeffree   Seconded: Pat Thaler
    - Conditionally approve sending P802d to RevCom.
      Confirm the PAR for P802d in http://www.ieee802.org/1/files/public/docs2015/new-parsons- URN-Namespace-PAR-1115-v01.pdf
      Confirm the CSD for P802d in http://www.ieee802.org/1/files/public/docs2015/new-parsons- URN-Namespace-CSD-1115.pdf
      P802d-D1.0 had 100% approval at the end of the last sponsor recirculation ballot.
      In the WG (y/n/a): 28, 0, 0
      Proposed: Tony Jeffree   Seconded: Pat Thaler
    - Move to:
      Approve sending P802.1Qch D1.1 to Sponsor Ballot
      Confirm the PAR for P802.1Qch in https://development.standards.ieee.org/get-file/P802.1Qch.pdf?t=84883700003
      Confirm the CSD for P802.1Qch in
      http://www.ieee802.org/1/files/public/docs2014/ch-mjt-cyclic-queuing-and- forwarding-par-csd-0814-v01.pdf
      P802.1Qch D1.1 had 100% approval at the end of the last WG recirculation ballot.
      In the WG (y/n/a): 28, 0, 0
      Proposed: Tony Jeffree   Seconded: Pat Thaler
    - Approve forwarding P802.1CS PAR documentation in
      http://ieee802.org/1/files/public/docs2016/cs-LRP-PAR- 1116-v01.pdf to NesCom

Approve CSD documentation in http://ieee802.org/1/files/public/docs2016/cs-LRP-CSD- 1116-v01.pdf
In the WG (y/n/a): 28, 0, 0
Proposed: Feng Chen   Seconded: Norm Finn

- 802.1 approves the response to the ITU-T Q13/15 liaison LS 378
  http://www.ieee802.org/1/files/public/docs2016/liaison-response-ITU-T-SG15-LS378-1116- v01.pdf
  Proposed: John Messenger   Seconded: David Chen
  For: 26   Against: 0   Abstain: 0
- 802.1 approves the response to the ITU-T Q11/15 liaison LS 382
  http://www.ieee802.org/1/files/public/docs2016/liaison-response-ITU-T-SG15-LS382-1116- v01.pdf
  Proposed: John Messenger   Seconded: David Chen
  For: 25   Against: 0   Abstain: 0
- 802.1 approves the liaison letter to the MEF Forum
  http://www.ieee802.org/1/files/public/docs 2016/liaison-MEF-CM-1116-v01.pdf
  Proposed: John Messenger   Seconded: David Chen
  For: 26   Against: 0   Abstain: 0
- 802.1 approves the response to the AVnu Alliance
  http://www.ieee802.org/1/files/public/docs 2016/liaison-response-avnu-1116-v01.pdf
  Proposed: Don Pannell   Seconded: Craig Gunther
  For: 25   Against: 1   Abstain: 0
- 802.1 approves the liaison letter to BBF
  http://www.ieee802.org/1/files/public/docs2016/liaison-BBF-YANG-1116-v01.pdf
  Proposed: Jessy Rouyer   Seconded: John Messenger
  For: 24   Against: 0   Abstain: 0
- 802.1 approves the liaison letter to ONF
  http://www.ieee802.org/1/files/public/docs2016/liaison- ONF-YANG-1116-v01.pdf
  Proposed: Jessy Rouyer   Seconded: Mick Seaman
  For: 26   Against: 0   Abstain: 0
- The TSN TG will continue to have virtual conferences weekly on Mondays from 8AM (US-Pacific) to 10AM (US-Pacific).
  Access information is posted on the http://www.ieee802.org/1/pages/tsn.html page and will be updated as necessary.
  Agenda will be announced on the 802.1 email reflector by the Friday before.
  Proposed: Rodney Cummings   Seconded: Craig Gunther
  Approved by acclamation
- 802.1 resolves to hold pre-meeting(s) on the Monday morning of the March 2017 Plenary session for TSN.
  Proposed: John Messenger   Seconded: Craig Gunther
  Approved by acclamation
- 802.1 authorizes the January 2017 Interim to generate PAR and CSD for pre-circulation to the EC for an amendment to IEEE 802.1AC to include 802.15.3 MAC.
  Proposed: Mick Seaman   Seconded: John Messenger
  For: 24   Against: 0   Abstain: 0
- 802.1 approves the press release on IEEE 802.1Qbz, and allows IEEE-SA staff to make editorial changes as necessary
  http://ieee802.org/1/files/public/docs2016/bz-draft-press-release-1116-v02.pdf
  Proposed: Craig Gunther   Seconded: Don Pannell
  For: 27   Against: 0   Abstain: 0

- 802.1 requests EC approval to co-host the 2017 Deterministic Ethernet Forum as described in this presentation: http://www.ieee802.org/1/files/public/docs2016/admin-cgunther-DE-Forum-2017-1116-v02.pdf.
  The event is scheduled to occur on April 27-28, 2017 in Vienna, Austria.
  In the WG (y/n/a): 25, 0, 2
  Proposed: Craig Gunther   Seconded: Don Pannell
  - Security motions:
    - 802.1 confirms the PAR and CSD and requests EC conditional approval to forward P802.1AEcg to RevCom.
      Proposed: Seaman   Seconded: Randall
      For: 26   Against: 0   Abstain: 0
    - 802.1 requests EC approval of the CSD and to forward the following PAR to Nescom:
      - P802.1AR-Rev "Secure Device Identity"
        http://www.ieee802.org/1/files/public/docs2016/ar- seaman-rev-draft-par-0916-v02.pdf
        http://www.ieee802.org/1/files/public/docs2016/ar- seaman-rev-draft-csd-0916-v02.pdf
      Proposed: Randall   Seconded: McIntosh
      For: 26   Against: 0   Abstain: 0
    - 802.1 authorizes the editor (Mick Seaman) of P802.1AR-Rev to conduct Working Group balloting following NesCom approval of the proposed PAR.
      Proposed: Randall   Seconded: Seaman
      For: 27   Against: 0   Abstain: 0
    - 802.1 authorizes the Security Task Group to hold teleconferences to progress P802.1ARce, P802.1AEcg, P802.1Xck, P802E and task group matters arising:
      - Dates/times to be announced subject to notice of at least 10 days to the 802.1 email exploder
      Proposed: Randall   Seconded: Seaman
      Approved by acclamation
  - DCB motions:
    - Approve forwarding IEEE 802c PAR modification documentation in http://www.ieee802.org/1/files/public/docs2016/802c-thaler-PAR-Mod-0916.pdf to NesCom
      Approve CSD documentation in http://www.ieee802.org/1/files/public/docs2015/lasg-mjt-802c-CSD-0315-v02.pdf
      Supporting Material:
      - No comments were received on the PAR. The CSD wasn't changed by the PAR modification. The CSD in the motion is the CSD that was previously approved by the EC (March 2015 motion #14)
      Mover: Pat Thaler   Second: Yizhou Li
      For: 25   Against: 0   Abstain: 0
    - Conditionally approve sending P802c to Sponsor Ballot
      Confirm the PAR and CSD for P802c in http://www.ieee802.org/1/files/public/docs2015/lasg-mjt-802c-CSD-0315-v02.pdf
      P802c-D1.2 had 87% approval at the end of the last sponsor recirculation ballot. Subsequently 2 of the "no" voters changed their vote to "yes" resulting in an approval of 95%.
      In the WG (y/n/a): 24, 0, 1
      Mover: Pat Thaler   Second: Max Riegel

- o OmniRAN motions:
    - ▪ Approve OmniRAN TG conference calls on:
        - o December 6th, 09:30 AM ET, 90mins (5GAA)
        - o December 13th, 09:30 AM ET, 90mins (P802.1CF)
        - o Further conference calls between the Jan 2017 interim and the March 2017 plenary with at least 10days prior notice to the 802.1 mailing list.
        - o Agenda and call-in details will be made available on the 802.1 mailing list and on https://mentor.ieee.org/omniran/bp/StartPage

        Moved: Max Riegel   Second: David Chen
        Approve by acclamation
    - ▪ Authorize OmniRAN TG to create an ICAID proposal addressing the 5G SC Action A and authorize the 802.1 chair to pre-circulate the ICAID proposal to the EC for consideration.
        Moved: Max Riegel   Second: John Messenger
        Vote: 22, 0, 1
- o Maintenance motions:
    - ▪ Authorize Maintenance TG to hold teleconferences on 3rd January and 7th March 2017 at 11am EST if necessary. Access information will be posted to the 802.1 reflector in advance.
        Proposed: Messenger   Second: Rouyer
        Approve by acclamation
    - ▪ 802.1 confirms the PAR and requests EC approval to forward P802.1AX-Cor1 to RevCom.
        Proposed: Messenger   Second: Rouyer
        For: 23   Against: 0   Abstain: 0
    - ▪ 802.1 instructs the editor of 802.1Q-Rev (John Messenger) to prepare drafts for and conduct Working Group balloting.
        Proposed: Jeffree   Second: Rouyer
        For: 24   Against: 0   Abstain: 0
    - ▪ 802.1 requests EC approval to forward the comment responses in document
        - o http://ieee802.org/1/files/public/docs2016/liaison-randall-SC6ResponseQcd-1116-v01.pdf
            to ISO/IEC JTC1 SC6 under the PSDO agreement.
            These are responses to the comments received on recent 60-day ballot of 802.1Qcd-2015.

        Proposed: Messenger   Second: Rouyer
        For: 21   Against: 0   Abstain: 0
    - ▪ 802.1 requests EC approval to forward the following standards to JTC1 SC6 for adoption under the PSDO agreement:
        - o 802.1AC-2016 - MAC Service Definition following publication
        - o 802.1Qbu-2016 - Frame Pre-emption
        - o 802.1Qbz-2016 - Enhancements to Bridging of IEEE 802.11 Media
        - o 802.1Q-2014/Cor 1-2015 - using the new corrigendum process

        Proposed: Messenger   Second: Rouyer
        For: 21   Against: 0   Abstain: 0
    - ▪ 802.1 requests EC approval to forward the following documents to ISO/IEC JTC1 SC6, for information under the PSDO agreement at sponsor ballot time:
        - o P802.1Qch

        Proposed: Messenger   Second: Rouyer
        For: 23   Against: 0   Abstain: 0

- 802.1 requests EC approval to forward the following documents to ISO/IEC JTC1 SC6, for information under the PSDO agreement at sponsor ballot time:
  - P802c

  Proposed: Messenger   Second: Rouyer

  For: 24   Against: 0   Abstain: 0

There was no other business to discuss and the closing plenary meeting was adjourned at 5:30PM.

5 Next meeting

16-19 January 2017, Atlanta, GA, USA