

APPROVED MINUTES
ASC C63® SC1: Techniques and Development
May 4, 2011
ETS-Lindgren
Cedar Park, Texas

Presiding Officer: Dennis Camell

Date Prepared: May 4, 2011

Members Present:

Mark Arthurs
Colin Brench (Vice-Chair)
Dennis Camell (Chair)
Zhong Chen
Bob DeLisi
Don Heirman
Harry Hodes
H. R. Hofmann
Dan Hoolihan
Steve Jones
Victor Kuczynski
Janet O'Neil (Secretary)
Doug Parker
Ghery Pettit
Nate Potts
Ralph Showers
Jeff Silberberg

Don Umbdenstock
Art Wall

Members Absent:

Masud Attayi
Tim Harrington
Randy Long
Werner Schaefer
Bill Stumpf

Guests:

Poul Andersen
Mac Elliott
Dean Ghizzone
Ed Hare
Philip Keebler
Greg Kiemel
Jeff Moser
Dheena Moongilan
Hazem Refai
Steve Whitesell

Employer:

Sony
Amphenol HSI
NIST
ETS-Lindgren
Underwriters Laboratories Inc. (UL)
Don HEIRMAN Consultants
Acme Testing Co./ACIL
Hofmann EMC Engineering
Hoolihan EMC Consulting
FCC
Vican Electronics
ETS-Lindgren
Liberty Labs
Intel
Liberty Labs
University of Pennsylvania
FDA Center for Devices & Radiological Health
(present via telecom)
Tyco Retail Solutions
RCC Inc.

Employer:

RIM
FCC
L-A-B
Cisco Systems, Inc.
DLS Electronic Systems

Employer:

SAE
Motorola
Northwest EMC
ARRL
EPRI
Northwest EMC
Underwriters Laboratories Inc. (UL)
Alcatel-Lucent
University of Oklahoma
VTech Communications

1.0 Call to Order—Chair

1.1 Opening Remarks and Announcements: Chair

1.2 Meeting Logistics Announcements: Host

1.3 Introductions: Secretary

Chair Dennis Camell called the meeting to order at 8:30 am. A round of introductions was made. The Chair thanked the meeting host, ETS-Lindgren, for the meeting arrangements.

2.0 Approval of the Meeting Agenda: Chair

Dennis Camell presented the draft agenda for the May 4 meeting for review. (See Attachment A.) **Don Heirman moved to approve the agenda as presented. The motion was seconded and approved.**

3.0 Presentation of [patent slides](#): Chair

Dennis Camell gave a presentation that reviewed the status of the meeting fees, ANSI policy related to Intellectual Property (IP), inappropriate topics for IEEE working group meetings and the working group meeting slide template. (See Attachment B.)

4.0 Presentation of [meeting attendance](#) fee slides: Chair

Dennis Camell reviewed the meeting attendance fees and noted Dan Hoolihan, Vice-Chair of C63®, would contact individuals present who are required to pay a meeting attendance fee.

5.0 Approval of Minutes of Previous Meeting: Secretary

Secretary Janet O’Neil presented the minutes of the October 27, 2010 meeting held in Troy, Michigan at the SAE offices. Several changes were made as follows:

1. Correct the company name/affiliation of Harry Hodes to read: Acme Testing Co./ACIL
2. In Section 8.0, remove the sentence related to unintentional/intentional radiators in the first paragraph discussing C63.4.
3. In Section 8.0, revise the action item for Mark Arthurs related to C63.4 and the “scrolling h” issue to read: Mark Arthurs to update his report on the font size of the h and send this to the SC 1 members by the end of the year.
4. In Section 8.0, add the word “Unlicensed” following C63.10.
5. In Section 8.0, in the paragraph discussing C63.10, add word “below” before “30 MHz requirements”.
6. In Section 10.2 on Smart Grid, add an Action Item for interested members to contact Don Heirman before the next SC 1 meeting.

Don Heirman moved to approve the October, 2010 meeting minutes as amended with these changes. The motion was seconded and approved. See Attachment C for the approved minutes of the October 2010 meeting.

6.0 Review of [Subcommittee Membership](#): Secretary

6.1 Review of membership – Members at risk. Janet O’Neil advised that Larry Stillings of Compliance Worldwide has missed three consecutive meetings so he will be removed from the membership roster. This is in accordance with SC 1 membership policy. (See Attachment D for the updated membership tracking record.)

6.2 Consideration of Members—Ms. O’Neil advised there are two new SC 1 membership applications

to review, from Zhong Chen of ETS-Lindgren and from Don Umbdenstock of Tyco Retail Solutions. Mr. Camell showed the membership applications and resumes of Zhong Chen and Don Umbdenstock.

Mr. Camell confirmed the list of members in SC 1. (See Attachment E.) This includes the new members Zhong Chen and Don Umbdenstock as well as the official “scope” of the SC 1 Committee. **Don Heirman moved to approve the SC 1 membership list and scope as presented. The motion was seconded and approved.**

The Chair reviewed the roster of working group members as shown on the C63 website. Some revisions were made. The updated roster of working group members SC 1 roster with contact information is included in Attachment F.

ACTION ITEM: All working group Chairs need to complete their rosters and indicate their officers (Vice-Chair and Secretary) and submit to Chair Camell by the end of September.

7.0 Working Group Reports

C63.2: EM Noise & Field Strength Instrumentation

Working Group Chair: **Open**

Status: Current. No plans for further maintenance at this time.

C63.4: Emissions Measurements

Working Group Chair: [Don Heirman](#)

Status: Current. Maintenance underway.

Don Heirman provided a verbal update. There are several items to address; these are identified in Item 8 of the PINS approved at the October 2010 SC 1 meeting and in the introduction of the 2009 edition. Several interpretations have been made and will be addressed in the next revision. Test site validation above 1 GHz has more detail. The Intentional transmitter clause has been removed as it is adequately covered now in C63.10. Clarification of antenna calibration and the needed correction equations are included. The normative table for allowed antennas will be updated. The “scrolling h” font size and projection requirements are now addressed as a function of the size of the screen. The goal is to present the draft for the committee to review and discuss at the October 2011 meeting with publication in early 2012.

Mr. Heirman reiterated that this is the leading product of ANSI ASC C63®. Members of the working group are shown in Attachment F. Mr. Heirman welcomed anyone interested in this standard to join the working group.

C63.5: Antenna Calibration

Working Group Chair: [Dennis Camell](#)

Status: Current-2006. Next edition in progress.

Working group Chair Dennis Camell provided his report. (See Attachment G.)

He noted the PINS for this project is current and is posted to the C63 website. Seven people attended the working group meeting held on May 3. In two weeks the document will be reviewed one last time. He will send it to the SC 1 committee shortly and then it will be sent to the parent committee for balloting. Zhong Chen initiated a discussion related to the use of log and bicon antennas. He advised it is common practice that standard gain horn antennas are used at higher frequencies. The issue of using the same site for product measurements and antenna calibration

was discussed. It was agreed that the key is to not use the same portion of the ground plane for antenna calibration and product testing. Dan Hoolihan provided supporting comments. As noted in the report, the working group felt it is better to define a statement that the same site cannot be used for calibrations and product testing, but different areas on a site can be used. A drawing is included in Attachment G which shows how the different areas can be defined.

Regarding the IEC and the standard CISPR 16-1-6 on antenna calibration, Don Heirman noted that principal methods called out in ANSI C63.5 are being incorporated into the new standard. Measurement uncertainty will be addressed by the committee. Mr. Camell reminded those present that measurement uncertainty will remain in C63.5 until the new standard C63.23 is published. At that time, then measurement uncertainty will be removed from C63.5.

C63.10: Unlicensed Wireless Devices Testing

Working Group Chair: [Art Wall](#)

Status: Next edition in progress

Chair Art Wall presented his report. (See Attachment H for the power point summary report, Attachment I for the 2nd Draft C63.10 (20xx) v8 5-2-11 Summary of Comments and Attachment J for Comments on Section 7.14 of Draft 63.10.) He noted the working group met on the afternoon of May 2 and morning of May 3. The meetings were attended by 30 of the 55 working group members plus two observers and three call-in attendees. The 2nd draft of C63.10 (20xx) was circulated on March 18, 2011 and discussed during the working group meeting. The major points of discussion included:

1. Exception to Table 1 of C63.2 for log periodic dipoles above 1 GHz being proposed
2. Validation of test sites > 1 GHz – per CISPR 16-1-4:2007, validation limited to 1-6 GHz
3. Measurement of radiated emission above 1 GHz – proposal to change table height to 1.5 m and search height to 1 to 2.5 m (justification to be included in Annex).
4. Alternative procedure for small devices for measurements above 1 GHz – can eliminate search height and increase testing through-put.
5. New extrapolation factors for emissions below 30 MHz – separate factor below and above 0.625λ

The change in table height per item 3 may be an issue. Don Heirman noted that this is a significant change that must be fully justified. He suggested looking at the FAR test chamber environment for future changes to the document. Dennis Camell suggested giving a presentation at the next SC1 meeting on items 3 and 4 to educate the members on these topics. Don suggested addressing the below 30 MHz activity in C63.4 since this work is applicable there as well. Mr. Camell will mention this in his report to the parent committee tomorrow.

C63.23: Measurement Uncertainty

Working Group Chair: [Bob DiLisi](#)

Status: New Standard. Draft being written; Edition 1.0

Working group Chair Bob DeLisi presented his report. (See Attachment K.) He advised draft version 4 was circulated to the Working Group on April 8, 2011. Editorial and technical comments were received in response. A teleconference to resolve these comments was held on April 20, 2011. All comments were reviewed with Task Group members being assigned tasks to complete technical comments. In addition to resolving comments, examples of Type A contributor analysis needs to be added.

The next draft of the document will be circulated to the working group by the end of June followed by a four week comment period. The final draft is expected to be circulated to SC 1 prior to the October meetings.

C63.25: Time Domain Applications for Test Site Validation

Working Group Chair: Dennis Camell

Status: New Standard. Draft being written.

Chair Camell presented his report. (See Attachment L.) He noted that he received the documentation from Mike Windler, the former chair of this committee. The PINS is current and posted to the C63 website. The working group membership has been re-arranged. The current list of members is shown in Attachment F. Sample data has been shared with ACIL member labs to compare measurement methods above 1 GHz. Greg Kiemel noted Northwest EMC has conducted numerous measurements on using time domain including using a ten meter chamber and an OATS. Harry Hodes of Acme Testing Co. offered to take measurements using a covered OATS.

C63.26: Licensed Transmitter Testing

Working Group Chair: [Art Wall](#)

Status: New Standard. Draft being written.

Chair Art Wall presented his report. (See Attachment H.) The working group met in conjunction with the C63.10 working group as noted above. There are still a lot of holes in the document. The report includes a timeline for the activity planned. The schedule is ambitious and may slip a bit. The report includes recommendations for moving forward, including forming a new working group for measurements below 30 MHz. Mr. Wall noted that the consensus of the working group will be received before the document is circulated to the SC 1 committee.

8.0 Old Business - Chair

No old business was addressed.

9.0 New Business - Chair

No new business was addressed.

10.0 Review of Interpretation Requests: Chair

Chair Camell reviewed the recent questions raised on various documents and relayed how they were addressed. The first one involved C63.4. The second one involved C63.5, Table 1, Annex H and a request for an explanation of the different antennas that can be used for NSA.

Mr. Camell reviewed Werner Schaefer's recent request on interpretations (per his email to SC 1 dated Feb 25, 2011). Mr. Camell reviewed the operating procedures of C63 and the section applicable to interpretations.

Please see clause 11 of the operating procedures as described in this link:
http://www.c63.org/documents/misc/admin/c63_operating_procedures_2007.htm.

These go to the parent committee secretary who passes them along to the appropriate subcommittee. The subcommittee then addresses the interpretation reply following the procedure shown in the C63 operating procedures given on the C63 web site.

11.0 [C63.org](#) Website Use and Updates: Web Content Manager ([Ed Hare](#))

Ed Hare showed the significant updates made to the C63® website.

12.0 Review of the Action Items from Previous Meetings: Secretary

Secretary O'Neil advised that the updated action item list would be distributed to the SC 1 members along with the draft minutes from this meeting. (See Attachment M for the Action Items list.)

ACTION ITEM: O'Neil to distribute the updated consolidated action items and draft minutes from the May 4, 2011 meeting to the committee.

ACTION ITEM: O'Neil to send the password to the SC 1 committee so they can access the SC 1 "members only" section of the website. NOTE: This user and pass code is for access to the SC 1 page ONLY. Working groups under other SCs will have different user codes and passwords.

13.0 Standards Development - Next Steps: Chair

Chair Camell reported that all standards are active and there is nothing new to report.

14.0 Time and Place of Next Meeting: Chair

The next series of C63® meetings will take place in Lincroft, NJ for four days over October 3-6, 2011. Lincroft is near Red Bank, NJ. The SC 1 meeting date will be on Wednesday, October 5, 2011 at 8:00 am.

15.0 Closing Remarks and Adjournment: Chair

With no further business, Chair Camell adjourned the meeting at 10:50 am. He thanked everyone for coming to the meeting.

Minutes submitted by:



Janet O'Neil, Secretary, SC 1

ATTACHMENTS

Attachment A: Agenda for May 4 SC 1 Meeting

Attachment B: Patent Slides Required Meeting Template Slides for ASC C63®, IP Info

Attachment C: Approved Minutes from October 2010 SC 1 Meeting

Attachment D: Meeting Attendance/Tracking List

Attachment E: SC 1 Membership Roster and Scope of Committee

Attachment F: Working Group Roster

Attachment G: Camell Report on C63.5
Attachment H: Wall Report on C63.10 and C63.26
Attachment I: 2nd Draft C63.10 (20xx) v8 5-2-11 Summary of Comments
Attachment J: Comments on Section 7.14 of Draft 63.10.
Attachment K: DeLisi Report on C63.23
Attachment L: Camell Report on C63.25
Attachment M: Consolidated Action Items List