

Standards Committee Meeting

Reports:

*ISO/TC 43 (Acoustics) and ISO/TC 43/SC 1 (Noise),
Milan, Italy, September 2015*

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Background

The objective of the Acoustical Society of America (ASA) “Robert W. Young Travel Awards for Support of the Development of International Standards in Acoustics” is to provide limited financial support to assist individual experts to participate in the development of International Standards prepared by International Standards Organization Committees ISO/TC43 (Acoustics) and ISO/TC43/SC 1 (Noise) as well as by the International Electrotechnical Commission (IEC) Committee IEC/TC29 (Electroacoustics).

An ASA member who is expert in a technical field applicable to one or more working groups (WGs) of IEC/TC29, ISO/TC43, or ISO/TC43/SC1 and is willing to commit to contribute to the development of drafts and to actively participate in WG meetings may apply for this award. Recipients shall be US citizens living in the United States and be self-employed, an employee of a small firm, semiretired, or retired.

The 2015 Robert W. Young Travel Award recipients were Robert Hellweg, Jeff Schmitt, and Laura Ann Wilber.

Highlights of Meetings

TC43, SC1, and most of their WGs meet at approximately 18-month intervals to address issues and ensure progress in standards development. Their most recent meetings were in Milan, Italy, in September 2015.

The United States was also represented in the WGs by Elliott Berger, Patricia Davies, Kevin Lai, Travis McColley, Douglas Moore, Brad Moulton, Chadwyck Musser, Paul Schomer, and Douglas Winker. The United States participated in all three of the TC43/WG meetings and seven of the nine SC1/WG meetings.



Figure 1. The United States delegation to ISO/TC43/SC1 plenary meeting in Milan on September 17, 2015. Left to Right: Douglas Moore, Laura Ann Wilber, Kevin Lai, and Robert Hellweg.

TC43/WG1 (Threshold of Hearing), with Wilber participating, discussed several standards in the International Standards Organization (ISO) 389 series, some of which are being revised. Most of the standards considered by WG1 are contained in American National Standards Institute (ANSI) S3.6 (Audiometers). ISO has a standard for each transducer, whereas ANSI S3.6 has it all in one document. Generally, the reference equivalent threshold sound pressure levels (RET SPLs) are the same in the ISO and ANSI standards.

There was a discussion on voting on ISO/DIS 7029 (Statistical Distribution of Hearing Thresholds as a Function of Age) in which the United States voted negative because there was not enough information on why the standard needed to be changed and exactly what information went into the change. The project leader agreed to prepare a paper describing the threshold calculation procedure in detail along with a resolution of comments in addition to a proposed layout of ISO/FDIS 7029.

TC43/WG8 (Anechoic Qualification), with Schmitt as convener, and SC1/WG28 (Machinery Noise), with Hellweg as convener, met jointly and covered the following:

- The final draft amendments on the two standards for qualification of anechoic and hemi-anechoic chambers (ISO 26101 and ISO 3745 Annex A) were approved for international balloting. The first edition of ISO 26101 closed a loophole in ISO 3745 Annex A; however, it inadvertently caused many laboratories that met the criteria in ISO 3745 without using that loophole to no longer be qualified. The United States discovered this problem and proposed amendments to correct it. Schmitt and Winker provided data that were instrumental in the approval of both of these revisions.
- ISO 3744 is one of the more popular sound power level standards; however, it is considered too complicated by general practitioners. WG28 began working to simplify ISO 3744.

- Because there is no IEC standard on requirements for computerized data-acquisition systems, a proposed instrumentation guide for the TC43 measurement standards was discussed. The guide, prepared in part by Schmitt, would address requirements for the use of multichannel computerized data-acquisition systems as an alternative to the IEC 61672 standards on sound level meters, which are not applicable to computerized systems.

TC43/WG9 (Loudness), with Wilber as convener, is developing two standards as a revision to the Zwicker method in ISO 532:1975: ISO/CD 532-1 (revised Zwicker method) and ISO/CD 532-2 (Moore-Glasberg method), which do not yield the same results. The United States proposed Part 2, which is similar to ANSI/ASA 3.4-2007. Comments were discussed, and for both methods, it was agreed to prepare draft standards for international voting after resolution of the remaining comments. Work will begin on Part 3 for determining the loudness for time-varying signals based on the Moore-Glasberg method.

SC1/WG45 (Environmental Noise), with Hellweg participating, began work on a standard for measuring and eval-

uating wind turbine noise in the environment. Two ASA/ANSI standards are relevant: draft S12.9 Part 7 (Low Frequency and Infrasound) and S12.100 (Background Sound in Quiet Areas). WG45 also began working on a standard to determine the prominence of impulsive noise.

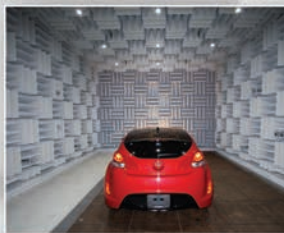
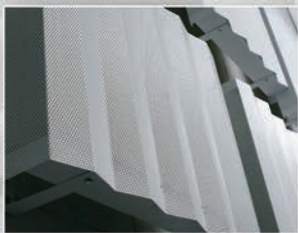
TC43 and SC1 Plenary Meetings

The US delegates to TC43 and SC1 plenaries were Hellweg, Lai, Moore, Wilber, and Davies (only SC1). TC43 and SC1 confirmed several standards and approved the circulation of numerous draft standards. SC1 approved the circulation of a ballot to form a new WG on "Tonal Prominence," and the United States will actively participate in this WG.

Summary

It is important for the United States to have effective representation at the ISO WG meetings because the responses to comments on draft standards are determined during these meetings. The authors believe we were successful overall in accomplishing our goals and are thankful to have received the ASA Robert Young Travel Award. If you wish further information, please contact the authors.

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