

CONFIDENTIAL

AMERICAN NATIONAL STANDARDS INSTITUTE

**Report of Mail-In Audit of
Optics and Electro-Optics Standards Council
ANSI-Accredited Standards Developer
July-August 2006**

CONFIDENTIAL

Note: This audit report and the information contained herein shall remain confidential and shall not be disclosed to any person other than the auditee, appropriate ANSI staff, the auditor, and, as appropriate, members of the reviewing bodies (i.e., the Executive Standards Council and the ANSI Appeals Board). The auditee may provide the audit information and reports received to whomever it deems appropriate.

1. Introduction

The authority for ANSI to audit ANSI-accredited standards developers is included in clause 4.1.3 of the *ANSI Essential Requirements: Due Process Requirements for American National Standards (ANSI Essential Requirements)*. The purpose of an audit is to determine whether there is any evidence of non-compliance with the criteria for accreditation and to ascertain as far as possible if the procedures and practices of an ANSI-accredited standards developer continue to be consistent with the current *ANSI Essential Requirements*. When possible, in a separate report, the auditor will recommend changes to the operation of the auditee that are intended to increase efficiency or effectiveness.

The *ANSI Auditing Policy and Procedures* allow an auditee to provide all relevant standards material to ANSI via the mail or electronically under circumstances approved by the Director of the ANSI Standards Developer Audit Program. The audit will then be performed without an on-site review of the developer's standards related documentation. It was determined that the Optics and Electro-Optics Standards Council (OEOSC) was eligible for a mail-in audit.

Dr. H. Glenn Ziegenfuss served as the auditor. A pre-audit telephone conference was held on 11 July 2006 with Gene Kohlenberg, Executive Director, OEOSC; Glenn Ziegenfuss, ANSI Auditor; and Jay Moskowitz, Director, ANSI Standards Developer Audit Program. This provided an opportunity for questions and answers from both parties. The mail-in audit was conducted during July and August 2006 at the location of the auditor.

2. Background

The Optics and Electro-Optics Standards Council (OEOSC) was formed in April 1993, with participation by APOMA, COM, LEOMA, OSA, and SPIE. It has been serving as the administrative sponsor and secretariat for the Accredited Standards Committee for Optics and Electro-Optical Instruments (ASC OP) since its accreditation as an ANSI Accredited Standards Committee on 23 February 2000. Some of the original sponsoring organizations have discontinued their involvement, but the National Institute of Standards and Technology has become a sponsor.

OEOSC has begun to provide training services for companies that want assistance in testing their optical products optical surface appearance imperfections.

ASC OP sponsors two American National Standards, ANSI/OEOSC OP3.001-2001 and ANSI/OEOSC OP1.002-2006. The first standard was developed using the *Model*

Procedures for an Accredited Standards Committee. The second standard was developed using procedures that were adapted from the *Model Procedures for an Accredited Standards Committee.*

3. Scope of the Audit

The audit involved a review of the operations of OEOSC as related to standards development and associated activities, including continuity of administrative oversight and support of the standards activities. As it was determined by the Director, ANSI Standards Developer Audit Program, that ASC OP qualified for a mail-in audit, all available documentation concerning the development of their newly developed standard, OEOSC OP1.002-2006, For optics and electro-optical instruments – Optical elements and assemblies – Appearance imperfections, was reviewed. The previous audit reviewed the development of their other standard.

This audit report, including the findings, is based solely on the standards and documentation actually reviewed. The audit report should not be viewed or relied upon as evidence of anything beyond the scope of the documentation reviewed. The audit did not involve the accounting or financial aspects of OEOSC.

The audit took into consideration the practices and actions, records, and reports of OEOSC in implementing the operating procedures to comply with ANSI criteria, rules, procedures, and requirements including, but not limited to, the following items:

- Criteria for Accreditation
- Due Process Requirements
- Criteria for Approval and Withdrawal of American National Standards
- Other ANSI Requirements

4. Audit Objectives

The following audit objectives formed the basis of the audit:

- Based on the evidence reviewed, confirm adherence by OEOSC to the criteria for accreditation.
- Based on the evidence reviewed, confirm that OEOSC procedures and practices continue to be consistent with the approved procedures and with current ANSI Requirements.
- Recommend changes in procedure when, in the opinion of the auditor, such changes would result in more efficient or effective operations.

5. Summary of Audit Results

The audit identified areas where activities are notable, as indicated in Section 8A of this report. Under separate cover, suggestions for potential improvements in efficiency and effectiveness are offered for consideration. The audit reviewed the recommendations from the regular audit of the Accredited Standards Committee for Optics and Electro-

Optical Instruments (ASC OP), held in December 2001, and efforts made to address non-compliances. The results of this review are contained in Section 8B of this report. The audit also identified several areas where the auditor believed certain findings and recommendations were appropriate, as indicated in Sections 8C and 8D of this report.

6. Conduct of the Audit

After initial preparation, including the completion of the pre-audit checklist by OEOSC, the audit was conducted in three phases: an examination of records and documentation by the auditor; development of audit findings, recommendations, and comments by the auditor; and a post-audit conference with OEOSC staff.

7. Examination of Records and Documents

OEOSC provided the auditor with a copy of the completed pre-audit questionnaire (Attachment A), as well as documentation substantiating the responses. A review of the pre-audit questionnaire and the accompanying documentation provided the following general findings:

OEOSC, as an ANSI-accredited standards developer, has unique accredited procedures, the ASC OP Procedures for the Development and Coordination of American National Standards, dated 2 May 2005. The standards development process is as follows: The procedures have been adapted and updated from Annex A of the *ANSI Procedures for the Development and Coordination of American National Standards*. There are a few items that are not consistent with the current edition of the ANSI Essential Requirements that should be addressed. These items are as follows:

a) In 3.1 d) and e) there is a referral to 11.3 regarding interpretations. Clause 11.3 just refers back to 3.1. There should be a policy included in the procedures or as a separate document indicating whether and how OEOSC handles interpretations.

b) In 5.4 interest categories are mentioned in the very general sense, but they are not listed nor are they defined. The interest categories should be included either in the procedures or in a separate document along with definitions of those categories. In the 14 July 2006 edition of these procedures, this item has been addressed. These new procedures have not been submitted to ANSI for approval.

c) In Section 6, subgroups are discussed, but their official role in developing standards is not defined. If the subgroups are responsible for any standards, they need to be defined and they need to comply with the rules for balance, voting, and all the other rules for standards committees. If they are only advisory to the main committee, that should be so stated. In the 14 July 2006 edition of these procedures, the item is addressed. However, changing these groups to consensus bodies may cause additional problems with balance and participation due to the relatively low number of participants. The 14 July 2006 edition has not been submitted to ANSI for approval.

d) In 8.1, reasons are required for all negative or abstain votes. Consideration should be given regarding providing reasons for personnel matters and perhaps have this requirement deleted for those items.

e) In 8.6, the procedures need to be revised to reflect that all objectors need to be advised in writing regarding the disposition of their comments and they also need to be advised in writing regarding their rights to appeal. In the 14 July 2006 edition of the procedures the second item has been addressed, but the first item has not. These new procedures have not been submitted to ANSI for approval.

f) In 9.2, the procedures should be revised to reflect that ANSI no longer requires two copies of the standard. The list of items in this clause should be updated to reflect the current edition of the *ANSI Essential Requirements*. In the 14 July 2006 edition of the procedures, this item has been addressed. These new procedures have not been submitted to ANSI for approval.

OEOSC sponsors two ANSI-approved standards. The organization staff member responsible for the maintenance of OEOSC's American National Standards is Mr. Gene Kohlenberg, Executive Director.

Internationally, OEOSC is responsible for the TAG activities for ISO TC 172, Optics and photonics. They participate in the standards development activities of this ISO committee and propose OEOSC standards for adoption as ISO standards. They also consider ISO TC 172 standards for adoption as American National Standards, but none has been adopted to date.

Nationally, OEOSC does not have any formal relationships with other standards developers, but members of OEOSC are members of other organizations, specifically ASTM International committees.

The staff of OEOSC does not participate on the ANSI Organization Member Forum or any other ANSI committee.

Since there is only one staff member in OEOSC, training consists of this person monitoring the ANSI web site and other ANSI media for information on standards and the requirements for American National Standards.

There was no project management mechanism provided in the data provided to track the standards for OEOSC. Since they only have two standards, the auditor considers it impractical to develop a system to track the standards.

For the most part, OEOSC provides information in electronic form to its consensus bodies and to ANSI. In the beginning of the development of this standard some items were handled in paper, but at the end of the process everything appears to have been handled electronically.

OEOSC does not really have a Standards Interpretation Policy. It is mentioned in clause 11.3 of their Procedures for the Development and Coordination of American National Optical Standards, but does not provide any detail on the mechanism for handling the interpretations. According to OEOSC, no interpretations have been received in the past year.

OEOSC has a Records Retention Policy. It is contained in Clause 14 of their Procedures for the Development and Coordination of American National Optical Standards. It is in

compliance with the minimum requirements of the current edition of the *ANSI Essential Requirements*.

OEOSC has a Metric Policy. It is contained in Clause 16 of their Procedures for the Development and Coordination of American National Optical Standards. It states that the International System of Units (SI) is the preferred system for units of measure. In the standard audited, metric units are used throughout without US customary units.

OEOSC does not have a Commercial Terms and Conditions Policy. A review of the standard revealed that there were no commercial terms and conditions in the standard. In the 14 July 2006 edition of their procedures, a new Section 18 has been added stating that OEOSC will comply with the *ANSI Essential Requirements* regarding Commercial Terms and Conditions. These new procedures have not been submitted to ANSI for approval.

OEOSC does not have a Patent Policy and reports that no patent issues have been raised or identified. In the 14 July 2006 edition of their procedures, a new Section 17 has been added stating that OEOSC will comply with the ANSI Patent Policy. These new procedures have not been submitted to ANSI for approval.

According to the records at ANSI, the 2002 and 2003 Compliance Forms were not submitted prior to the initiation of this audit. They were submitted during the conduct of this audit.

The auditor reviewed the questionnaire completed by OEOSC (Attachment A), as well as documentation substantiating the responses. All of the documentation necessary to complete this audit was available.

The auditor emphasized the following specific areas in the examination of OEOSC documentation:

A. Review of Documentation Indicating Evidence of Consensus and Due Process.

The auditor reviewed OEOSC OP1.002-2006, For optics and electro-optical instruments – Optical elements and assemblies – Appearance imperfections.

A PINS form was submitted on 25 April 2002 with the title, "Optics and electro-optical instruments – Optical elements and cemented subassemblies surface imperfection." A revised PINS form was submitted on 14 December 2002 with the revised title, "Optics and electro-optical instruments – Optical elements and assemblies – Appearance imperfections." Both were completed correctly and in timely fashion.

The first BSR-8 form was submitted but there was no copy in the documentation. The initial public review was incorrectly listed in the 2 July 2004 issue of *Standards Action* under the PINS section (see Attachment B). ANSI acknowledged the error (see Attachment C) and it was re-listed in the 23 July 2004 issue of *Standards Action* for a period of 60 days and a comment deadline of 21 September 2004 (see Attachment D). A second BSR-8 form was submitted on 28 November 2005 after having addressed a number of comments from ANSI staff on their first BSR-9 form. A single page of changes to the document was included. The BSR-8 form was completed correctly. It

was submitted after the consensus ballot was complete. A second public review announcement for OEOSC OP1.002-2006 appeared in the 9 December 2005 issue of *Standards Action* with a thirty-day comment deadline of 8 January 2006.

An initial BSR-9 form was submitted, on 25 October 2004 (see Attachment E), but ANSI staff returned it with a request for clarification on several items (see Attachment F). There were several problems with the responses on the form, but it did show a balanced consensus body with four producers, three users, and five general interest members. A second BSR-9 form was submitted, but it was also returned for additional information (see Attachment G). There was no copy of this form in the documentation. The revised form was submitted on 3 March 2006 (see Attachment H). During the audit, OEOSC located an email message forwarding the revised form with the consensus body ballot results to the members of the consensus body. The revised form was completed correctly and included a complete consensus body listing including interest categories. However, the consensus body was completely different from what was listed on the first BSR-9 form (nine producers, five general interest, and no users). The three users were now listed as producers. There was also no documentation to explain as to whether the members changed their interest category or whether the first BSR-9 form was in error. The second BSR-9 form was submitted within one year of the close of the second public review period.

ANSI provided a notice of final approval on 7 March 2006 and the announcement was included in the 17 March 2006 issue of *Standards Action*.

B. Review of Documentation Indicating the Disposition of Views and Objections

There was a total of five ballots issued: 23 November 2003, 29 December 2003, 4 November 2004, 29 January 2005, and 12 July 2005. None of the ballots could be considered recirculation ballots since they were all reissued because of an insufficient response or they were rewritten due to comments submitted on the previous ballot. All of the ballots were issued for a thirty-day period. Each included the issue date and the due date. Reminder letters were sent about ten days before the end of the balloting period and in some cases again right before the end of the ballot due date.

All of the comments and negatives were circulated to the members of the consensus body, but the members were not asked to reaffirm or change their votes. Technically, this was not a recirculation ballot, but instead the document was revised and sent out for ballot again. Some of this rebalotting appeared to be a reaction to the ANSI response to the first BSR-9 form that was submitted and returned for clarification. After the last ballot there were no negatives and only editorial comments to resolve. Since there were no objectors, there were no notifications of rights to appeal sent.

Two public reviews were held. One was after the first two ballots and the second was after the last ballot.

The minutes (see Attachment I) of the 21 January 2006 meeting of the OEOSC Committee on this standard discussed several changes that would be incorporated in the next revision.

C. Balance and Interest Categories of Consensus Body

The auditor noted that there was no representation in the user interest category and an participation fee. The participation fee is based on the number of employees at the member's company. Apparently, the fee can be waived if the member teaches a course related to the standard. There is nothing in the procedures regarding the waiver policy.

No one has been removed from the consensus body involuntarily.

OEOSC included documentation showing how they try to attract members of the US TAG to ISO TC 172, Optics and Photonics, but there was little information documenting any outreach efforts for the OEOSC domestic standards activity. There was a considerable amount of correspondence showing how new memberships are processed, and one indication that a potential member from Pakistan was discouraged from joining (see Attachment J). There does not appear to be any restriction in the OEOSC procedures regarding participants from other countries.

There was no evidence in the documentation submitted that the consensus body list was circulated to the members on an annual basis as required by their procedures. However, OEOSC reported that they maintain the consensus body list on their web site which the ExSC deems sufficient in lieu of distributing hardcopies of the roster.

According to the final BSR-9 form, the consensus body is seriously out of balance (see Attachment G). There were nine producers and five general interest members, with no users. As noted earlier in this report, this is a significant shift in membership from the original BSR-9 form. The procedures call for reasonable balance, with no dominance from a single interest category. With a substantial majority of the members in the producer category, this is not in compliance with the *ANSI Essential Requirements*.

The standard is not a safety or safety related standard, but the balance requirements were not met in either case.

The numerical consensus requirements were met even though there was a relatively high number of not returned ballots.

D. Appeals

OEOSC has an Appeals Procedure. It is contained in Clause 12 of their Procedures for the Development and Coordination of American National Optical Standards. The procedure mirrors the one that was used previously in the *ANSI Procedures for the Development and Coordination of American National Standards*, except that it has been updated to reflect that the ExSC does not participate in creating the appeals panel. It meets the minimum requirements of the *ANSI Essential Requirements*. OEOSC reported that they have had no appeals since the last audit.

In 8.6 of their Procedures for the Development and Coordination of American National Optical Standards, each objector is to be notified of their right to appeal. As noted in the

section above regarding recommended changes to these procedures, OEOSC needs to add "in writing" when notifying objectors of their right to appeal.

E. Compliance with ANSI Requirements for Publication and Maintenance of Standards

In reviewing OEOSC compliance with ANSI requirements for publication of standards, the auditor notes that OEOSC arranges for publication of their American National Standards. The American National Standards include on the cover the words "Approved American National Standard" and the approved ANSI Logo. The date of ANSI approval is included on the title page. A unique alphanumeric designation is used to identify their American National Standards. For some unexplained reason, the title of the published standard was slightly different than the title included on the corrected PINS form, the BSR-8 form, and the BSR-9 form. It appears to be only a small grammatical difference. The title of the published standard is "For optics and electro-optical instruments – Optical elements and assemblies – Appearance imperfections."

OEOSC announces the availability of their standards on their web site at www.optstd.org. The standards are available in either paper or electronic form. The standards are also available through the ANSI Store.

In reviewing OEOSC compliance with ANSI requirements for maintenance of standards, the auditor noted that this audit only covered their newly completed standard, and the previous standard has not yet exceeded the five-year review period.

8. Development of Audit Findings, Recommendations and Comments:

The auditor developed the following findings, recommendations, and comments:

A. The auditor noted the following:

- i) The auditor noted that OEOSC encourages and promotes broad participation of interested persons and organizations.
- ii) The auditor noted that OEOSC utilizes their web site (www.optstd.org) to announce information for those who are interested and have access to the web. The auditor believes that use of the web site increases the visibility of the standards and potentially increases participation on the consensus body.
- iii) The auditor noted that OEOSC makes a substantial effort to resolve all comments and objections and to ensure that consensus is achieved. In reviewing the actions taken, the auditor found that the consensus body was willing to make substantive technical changes, even though the time for approval of the standard was lengthened.
- iv) The auditor noted that OEOSC presently conducts the ANSI public review after the conclusion of the consensus ballot and any attempts to resolve objections. OEOSC staff indicated that the public review is held after the conclusion of the consensus ballot because of the changes that are made to the document as a result of the consensus ballots.

- v) The auditor noted that membership is not restricted on the basis of technical qualifications. Participation is not conditional upon membership in any organization.
- vi) The auditor noted that the interest category of participants is determined through self-declaration.
- vii) The auditor noted that OEOSC has submitted a PINS form to ANSI when the title of the standard changed.
- viii) The auditor noted that OEOSC submits ANSI PSA forms electronically, thus reducing the potential for delays and errors.
- ix) The auditor noted that no appeals of the approval of the OEOSC standards have been filed. The appeals process is outlined in Clause 12 of their Procedures for the Development and Coordination of American National Optical Standards.
- x) The auditor noted that OEOSC does not have any formal liaisons with other standards developers as the standard is unique and there is no need for harmonization or coordination.
- xi) The auditor noted that OEOSC actively participates in international activity in the area of standardization, specifically in ISO TC 172, Optics and Photonics.
- xii) The auditor noted that OEOSC American National Standards are available as individual documents, in paper or electronically, and in the *ANSI Standards Store*.
- xiii) The auditor noted that OEOSC provided a written statement during the course of the audit that the ANSI Patent Policy found in clause 3.1 of the *ANSI Essential Requirements* will be used as the OEOSC patent policy.
- xiv) The auditor noted that the completed OEOSC 2006 *Compliance Form* is on file with ANSI.
- xv) The auditor noted that OEOSC has a Policy on Evidence of Compliance, which is contained in Clause 14 of their Procedures for the Development and Coordination of American National Optical Standards. It is in compliance with the minimum requirements of the current edition of the *ANSI Essential Requirements*, and is on file at ANSI.
- xvi) The auditor noted that OEOSC has a Metric Policy, which is contained in Clause 16 of their Procedures for the Development and Coordination of American National Optical Standards and is on file at ANSI. It states that the International System of Units (SI) is the preferred system for the units of measure.
- xvii) The auditor noted that OEOSC has recently revised their operating procedures. The auditor noted that many of the concerns raised in this audit report are addressed in the proposed revision provided in the 14 July

2006 edition. The auditor further noted OEOSC intends to submit the final version to ANSI as soon as possible after this audit.

B. The auditor reviewed the recommendations from the December 2001 regular audit of OEOSC and observed the following:

i) **2001 Audit Recommendation.** The auditor recommends that, in accordance with clause 1.2.6 of the *ANSI Procedures*, ASC OP submit a PINS form at the initiation of the project to develop or revise an American National Standard, rather than ten days prior to the submission of the BSR-8 form (this was also six months after accreditation of the committee). In the opinion of the auditor such initiation begins when the project is approved by ASC OP. Registration of projects using the PINS form is designed to provide a central databank of information relative to voluntary national standards. It is useful for providing direct information to all interested parties and is a key element in planning and coordination. It is therefore crucial that submission of a PINS form be timely.

2006 Audit Finding. The auditor noted that the PINS form was submitted soon after the project was approved. This item has been fully addressed.

ii) **2001 Audit Recommendation.** The auditor recommends that, in accordance with clause A.8.1 of the *ANSI Procedures*, ASC OP issue a ballot that includes the four options of Affirmative; Affirmative, with comment; Negative, with reasons, and Abstain, with reasons. As noted in Part 7 of this report, no actual ballot was issued to the members of the consensus body.

2006 Audit Finding. The auditor noted that the ballots issued included the options of yes; yes, with comments; no, with comments; and abstain, with comments. This item has been fully addressed.

iii) **2001 Audit Recommendation.** The auditor recommends that, in accordance with clause A.8.1.3 of the *ANSI Procedures*, ASC OP issue a ballot for a fixed period of six weeks. In reviewing the standard, the auditor found that no actual letter ballot was issued, although all members of the consensus body apparently did submit a final vote.

2006 Audit Finding. The auditor noted that the ballot period in their new procedures is thirty days, or earlier if all ballots have been submitted. All ballots were issued for thirty days. This item has been fully addressed.

iv) **2001 Audit Recommendation.** The auditor recommends that ASC OP substantiate all votes in writing, particularly in those instances where the vote is obtained via email or other electronic means. The auditor noted that in two instances ASC OP recorded votes from members of the consensus body but there was no back-up documentation verifying the vote. Accurate record-keeping of votes cast is essential in order to provide evidence of consensus.

2006 Audit Finding. The auditor noted that all ballots were in the documentation and recorded properly. This item has been fully addressed.

- v) **2001 Audit Recommendation.** The auditor recommends that, in accordance with clause A.8.7 of the *ANSI Procedures*, ASC OP report final results of voting to the committee. The auditor found that the results are reported only to ANSI via the BSR-9 form. Methods of reporting can include a written report or a report given at a meeting and so recorded in the meeting minutes.

2006 Audit Finding. After a thorough review of all the documentation submitted, the auditor was unable to find any evidence that the final voting results were reported to the members of the consensus body. During the audit, OEOSC located an email forwarded the final BSR-9 form and the consensus body voting tally to the members of the consensus body. This item has been addressed.

- vi) **2001 Audit Recommendation.** The auditor recommends that, in accordance with clause 1.2.2 of the *ANSI Procedures*, ASC OP take additional efforts to ensure that the committee is balanced and no interest category is more than half of the total. The auditor reviewed the current consensus body roster and found that there is only one producer, two users, and four general interest members. In addition to being quite small, there is a clear imbalance of members.

2006 Audit Finding. Although the balance situation has tilted in the completely opposite direction, it is now out of balance with far too many producers versus either of the other two interest categories. This area still needs considerable effort and is not yet resolved.

- vii) **2001 Audit Recommendation.** The auditor recommends that, in accordance with A.7.1 of the *ANSI Model Procedures for Accredited Standards Committees* ASC OP ensure that meeting announcements are made in ANSI's *Standards Action*. The auditor was unable to find evidence that this was being done.

2006 Audit Finding. The auditor noted that OEOSC has made a commendable effort in announcing meetings in *Standards Action*. There was documentation showing announcements for seven meetings. This item has been fully addressed.

- viii) **2001 Audit Recommendation.** The auditor recommends that, in accordance with A5.5 of the *Model Procedures for Accredited Standards Committees* ASC OP maintain and update the ASC OP membership list and provide it to committee members at least once per year.

2006 Audit Finding. The auditor could find no evidence that the membership list was being provided to the members on an annual basis. During the audit, OEOSC reported that they intend to maintain the membership roster on their web site. This item has not been addressed.

- C. The auditor found areas of non-compliance. The following findings and recommendations are made to address these non-compliances:
- i) The auditor recommends that, in accordance with clause 4.1.3 of the *ANSI Essential Requirements*, OEOSC officially provide ANSI with their current operating procedures and, if the changes are considered by the ExSC to be substantive, the reaccreditation process shall be initiated. In reviewing the 2 May 2005 edition of the Procedures for the Development and Coordination of American National Optical Standards, the auditor found that they are not in compliance with the current edition of the *ANSI Essential Requirements*. The auditor also notes that these procedures were submitted to ANSI almost one year later on 27 April 2006. The auditor notes that several substantive changes have been proposed during the course of this audit and are included in the 14 July 2006 version. The auditor recommends that the new edition be completed after this audit and submitted to ANSI in a timely manner. OEOSC is required by clause 4.1.3 of the *ANSI Essential Requirements* to notify ANSI of any changes to procedures on record at ANSI. Further details regarding recommended procedural changes are included in Section 7 of this report and in several places in this section.
 - ii) The auditor recommends that, in accordance with clauses 3.0 and 3.5 of the *ANSI Essential Requirements*, OEOSC document the Standards Interpretation Policy and provide ANSI with a copy. The primary purpose for providing an Interpretation Policy is to protect the accredited OEOSC from liability resulting from incorrect or improper interpretations. The establishment of a formal method by which interpretations are offered diminishes this risk of liability. The auditor considers the current information in clauses 3.1 d), 3.1 e), and 11.3, to be inadequate. Further details are contained in Section 7 of this report.
 - iii) The auditor recommends that, in accordance with clauses 3.0 and 3.1 of the *ANSI Essential Requirements*, OEOSC either develop a patent policy or adopt clause 3.1 of the *ANSI Essential Requirements* as the OEOSC policy. The auditor notes that OEOSC has included a proposal in the 14 July 2006 edition of the Procedures for the Development and Coordination of American National Optical Standards. These new procedures should be submitted to ANSI for approval.
 - iv) The auditor recommends that, in accordance with clauses 3.0 and 3.2 of the *ANSI Essential Requirements*, OEOSC document the Commercial Terms and Conditions Policy and provide ANSI with a copy. The auditor notes that OEOSC has included a proposal in the 14 July 2006 edition of the Procedures for the Development and Coordination of American National Optical Standards. These new procedures should be submitted to ANSI for approval. Further details are contained in Section 7 of this report.

- v) The auditor recommends that, in accordance with clause 5.1 of the Procedures for the Development and Coordination of American National Optical Standards, OEOSC take formal action to add to the membership of the consensus body, document such action, and advise the consensus body, as required by the operating procedures. The auditor found that in the case of one applicant from Pakistan, OEOSC is not handling membership requests in accordance with the accredited procedures. Further details are contained in Section 7C of this report.
- vi) The auditor recommends that, in accordance with clauses 1.2, 1.3, 2.2, 2.3, and 3.3 of the *ANSI Essential Requirements*, OEOSC keep accurate records of membership changes. The auditor noted that the consensus body changed significantly for this standard from the original BSR-9 form that was submitted to ANSI to the final BSR-9 form that was submitted. There was no documentation indicating what occurred to justify such a change in membership. Adequate monitoring of balance and participation requires an accurate and up-to-date list of members of the consensus body and associated membership records. Further details are contained in Sections 7A and 7C of this report.
- vii) The auditor recommends that, in accordance with clauses 1.2, 1.3, 2.2, and 2.3 of the *ANSI Essential Requirements* and Clause 2 of the Procedures for the Development and Coordination of American National Optical Standards, OEOSC take additional efforts to ensure that the consensus body is balanced and no interest category is more than a majority of the total. The auditor noted clause 2.3 recommends that no single interest category constitutes a majority of the membership of a consensus body dealing with other than safety-related standards. The auditor found that the current consensus body roster appears to be seriously out of balance. Specifically, the final BSR-9 form indicates that there were nine producers and five general interest members with no users. Furthermore,
- a) The auditor suggests that OEOSC make additional efforts to encourage additional membership and suspend those members who are not actively participating.
- Further details are contained in Section 7C of this report.
- viii) The auditor recommends that the non-compliances listed in this audit report be reviewed at the next scheduled audit to verify that corrective action was taken.

9. Post Audit Conference

The findings, recommendations, and comments were discussed during a post audit teleconference call that was held on 25 October 2006. Those who participated were Gene Kohlenberg, Executive Director, OEOSC; Glenn Ziegenfuss, ANSI Auditor; and Jay Moskowitz, Director, ANSI Standards Developer Audit Program.

Finally, the auditor would like to express appreciation for the cooperation extended by the OEOSC staff, which helped significantly in expediting the audit process, enabled the audit to be effective, and provided an opportunity for discussions benefiting ANSI as well as OEOSC.

CONFIDENTIAL

CONFIDENTIAL

CONFIDENTIAL

CONFIDENTIAL