



# STANDARDS BULLETIN

June 2020

This [Standards Bulletin](#) from the Organization of Scientific Area Committees (OSAC) for Forensic Science provides an update on:

- Standards moving through the OSAC Registry approval process.
- Standards moving through the development process at standards developing organizations (SDOs).

**New standards placed on the OSAC Registry: 3**

**OSAC Registry documents open for comment: 9**

**SDO documents open for comment: 8**

## OSAC REGISTRY UPDATES



The [OSAC Registry](#) serves as a repository of scientifically sound forensic science standards that address discipline-specific forensic science needs. A document included on the Registry has progressed through the formal SDO process and has been published as a standard. OSAC elevates standards to the OSAC Registry as an endorsement of the document's high quality and to encourage its use by relevant stakeholders in the forensic science community.

## New Documents on the OSAC Registry

- [ANSI/ASB Standard 028, Wildlife Forensics Morphology Standards, First Edition, 2019](#) (OSAC Wildlife Forensics Subcommittee, effective June 3, 2020).
- [ASB Technical Report 033, Terms and Definitions in Bloodstain Pattern Analysis, First Edition, 2017](#) (OSAC Bloodstain Pattern Analysis Subcommittee, effective June 3, 2020).
- [ANSI/ASB Standard 047, Wildlife Forensics Validation Standard—Validating New Primers for Sequencing, First Edition, 2019](#) (OSAC Wildlife Forensics Subcommittee, effective June 3, 2020).

## Intent to Add to the OSAC Registry – Items Open for Comment

Please submit your comments by **11:59 p.m. ET on June 13, 2020** on whether the following standards should be included on the OSAC Registry:

- ANSI/ASB Standard 106, *Wildlife Forensics – Protein Serology Method for Taxonomic Identification*, First Edition, 2020. **Submit your comments [here](#).**
- ASTM E2916-19e1 *Standards Terminology for Digital and Multimedia Evidence Examination*. **Submit your comments [here](#).**
- ASTM E3016-18 *Standard Guide for Establishing Confidence in Digital and Multimedia Evidence Forensic Results by Error Mitigation Analysis*. **Submit your comments [here](#).**
- ASTM E3017-19 *Standard Practice for Examining Magnetic Card Readers*. **Submit your comments [here](#).**
- ASTM E3046-15 *Standard Guide for Core Competencies for Mobile Phone Forensics*. **Submit your comments [here](#).**
- ASTM E3150-18 *Standard Guide for Forensic Audio Laboratory Setup and Maintenance*. **Submit your comments [here](#).**

Please submit your comments by **11:59 p.m. ET on July 3, 2020** on whether the following standards should be included on the OSAC Registry.

- ANSI/ASB Standard 030, *Standard for a Quality Assurance Program in Bloodstain Pattern Analysis*, First Edition, 2019. **Submit your comments [here](#).**
- ASTM E3233-20 *Standard Practice for Forensic Tape Analysis Training Program*. **Submit your comments [here](#).**
- ASTM E3234-20 *Standard Practice for Forensic Paint Analysis Training Program*. **Submit your comments [here](#).**

## In the Comment Adjudication Phase

- [ANSI/ASB Standard 019, Wildlife Forensics General Standards, First Edition, 2019.](#)
- [ANSI/ASB Standard 022, Standard for Forensic DNA Analysis Training Programs, First Edition, 2019.](#)
- [ANSI/ASB Standard 029, Report Writing in Wildlife Forensics: Morphology and Genetics, First Edition, 2019.](#)
- [ANSI/ASB Standard 045, Standard for Stature Estimation in Forensic Anthropology, First Edition, 2019.](#)
- [ANSI/ASB Standard 046, Wildlife Forensics Validation Standards – STR Analysis, First Edition, 2019.](#)
- [ANSI/ASB Standard 048, Wildlife Forensics DNA Standard Procedures, First Edition, 2019.](#)
- [ANSI/ASB Standard 072, Standard for the Validation of Procedures in Bloodstain Pattern Analysis, First Edition, 2019.](#)
- [ANSI/ASB Standard 090, Standard for Sex Estimation in Forensic Anthropology, First Edition, 2019.](#)
- \*ASTM E1967-19 *Standard Test Method for the Automated Determination of Refractive Index of Glass Samples using the Oil Immersion Method and a Phase Contrast Microscope.*
- \*ASTM E2330 *Standard Test Method for Determination of Concentrations of Elements in Glass Samples using Inductively Coupled Plasma Mass Spectrometry (ICP-MS) for Forensic Comparisons.*

**\*NOTE:** To access the ASTM standards above, please visit the [Access to Standards](#) page on the OSAC website.

## At FSSB for Vote

- [ANSI/ASB Standard 036, Standard Practices for Method Validation in Forensic Toxicology, First Edition, 2019](#)

For a list of all standards currently under Registry consideration, please visit the [OSAC website](#).

Has your organization already started implementing OSAC Registry Approved Standards?  
Complete OSAC's [Laboratory Implementation Declaration Form](#) and send it  
to [mark.stolorow@nist.gov](mailto:mark.stolorow@nist.gov) to let us know.  
Share your implementation experience and be featured in a future OSAC news post.

### Published



On April 21, 2020 the American Academy of Forensic Science Standards Board (ASB) announced the publication of [ANSI/ASB Standard 032, Standards for a Bloodstain Pattern Analyst's Training Program, First Edition, 2020](#). This document, initially developed by OSAC's Bloodstain Pattern Analysis Subcommittee and finalized by the ASB Bloodstain Pattern Analysis Consensus Body, provides minimum pre-training educational requirements for an individual currently in, or entering a bloodstain pattern analysis training program. It also describes the minimum training requirements that a trainee must successfully complete prior to practicing as a bloodstain pattern analyst.

### Comment Period Open on Draft Documents

#### ASB:

- [ASB Standard 092, Canine Detection of Explosives](#). This new standard provides the training requirements for a canine team (i.e., canine handler and canine) and details follow-on assessments for trained canine teams in the field of explosives detection. This standard is intended to be used as the basis for all phases of the training process and includes certification procedures, training and assessments, record keeping, and document management. **Comment deadline June 22, 2020.**
- [ASB Best Practice Recommendation 060, Guidelines for Barrel and Overall Length Measurements for Firearms](#). This document provides the guidelines for measuring and reporting barrel length and overall length (BL-OL) of firearms, including guidelines for measurement traceability and estimating uncertainty of BL-OL measurements. This document does not apply to descriptive measurements of firearms. **Comment deadline June 29, 2020.**
- [ASB Standard 134, Standard for Analyzing Pathological Conditions and Anomalies in Forensic Anthropology](#). This new standard sets forth techniques and approaches for describing, documenting, interpreting, and reporting pathological conditions and anomalies from skeletal and dental material and radiographic images. It does not provide guidance for distinguishing between anomalies and normal skeletal variation, nor does it address cause and manner of death classification or skeletal trauma. **Comment deadline July 6, 2020.**

For the ASB documents listed above, download the [comment template](#) and return it to [asb@aaafs.org](mailto:asb@aaafs.org) by the comment deadline.

## ASTM International:

- [\*New Guide for Analysis of Forensic Geological Materials by Powder X-Ray Diffraction\*](#) (XRD) (WK72837). This guide makes recommendations for the preparation of forensic geological materials for XRD analysis; instrumental configuration to generate high quality XRD data; criteria for the identification of crystalline materials by XRD by comparison to published diffraction data; and guidelines for comparison of XRD patterns from two or more forensic soil samples to support criminal investigations. **Ballot closes June 10, 2020.**
- [\*New Practice for Standard Practice for the Collection, Preservation, and Analysis of Organic Gunshot Residue\*](#) (WK72856). This standard practice describes procedures for the sampling and preservation of organic gunshot residues (OGSR) recovered from hands, skin, clothing, and other substrates, also instrument conditions for subsequent analysis of samples by gas or liquid chromatography-mass spectrometry (GC-MS or LC-MS), and recommendations for reporting the significance of those findings. **Ballot closes June 10, 2020.**
- [\*New Guide for Forensic Glass Analysis and Comparisons\*](#) (WK72932). This guide is intended to assist individuals who conduct forensic glass analyses in the identification, evaluation, selection, and application of test methods that can be of value to an investigation. This guide describes an analytical scheme for glass fragments that is intended to advise and assist the analyst in the collection and interpretation of data resulting from these analyses. **Ballot closes June 10, 2020.**
- Revision of [\*E2917-2019a Practice for Forensic Science Practitioner Training, Continuing Education, and Professional Development Programs\*](#) (WK72728). This is an annex to E2917 and provides supplementary requirements for the seized drugs analysis discipline. **Ballot closes June 21, 2020.**
- [\*New Practice for Quality Assurance of Forensic Science Service Providers Performing Forensic Chemistry Analyses\*](#) (WK71108). This practice provides a framework of quality in the processing of evidence including maintaining a quality management system; personnel duties, qualifications, training, education, and professional development; facility considerations; evidence handling; analytical procedures; instrument and equipment performance; chemicals and reagents; casework documentation and reporting; proficiency and competency testing; method validation and verification; audits; deficiency of analysis; and documentation requirements. Annexes provide additional procedures that are discipline specific. **Ballot closes June 25, 2020.**

For access to the ASTM documents listed above, contact Brian Milewski ([bmilewski@astm.org](mailto:bmilewski@astm.org)) to become a member of [Committee E30](#) on Forensic Science.

## New Work Proposals for New or Revised Standards

The following documents are being initiated and are expected to result in a new or revised standard.

### ASB:

- On May 15, 2020 a Project Initiation Notification System (PINS) was published on page 33 in the [ANSI Standards Action](#). This will begin a 30-day period for public comment on the initiation of ASB's work on the following documents:
  - BSR/ASB BPR 144-202x, *Best Practice Recommendations for the Verification Component in Friction Ridge Examination*. This document provides best practice recommendations for how to conduct the verification phase during friction ridge impression examinations. These examinations apply to both suitability determinations and resulting conclusions addressing verification considerations (e.g., extent, utility, case type, approach), types of verification and applications options, and documentation. This document does not address technical review.
  - BSR/ASB Std 147-202x, *Standard for Analyzing and Reporting on Skeletal Trauma in Forensic Anthropology*. This standard provides requirements for documenting, describing, interpreting, and reporting skeletal trauma in forensic anthropology. It also provides requirements for the determination of trauma timing (i.e., antemortem, perimortem, or postmortem) and the identification of the mechanism that produced the trauma (i.e., high-velocity projectile, blunt force, sharp force, thermal). This document does not address cause and manner of death.

## OTHER NEWS

### New Resource Available for the Seized Drugs Discipline: Gas Chromatography-Mass Spectrometry Analysis Considerations Document

The OSAC's Seized Drugs Subcommittee has a new resource available for the forensic science community. The Gas Chromatography-Mass Spectroscopy (GC/MS) Analysis Considerations document aims to raise awareness of certain GC-MS analytical challenges and limitations that may occur during the analysis of specific substances in seized drug evidence. The document also includes references that explain limitations or considerations or demonstrate how to overcome these respective limitations or considerations. This document is available on the [Seized Drugs Subcommittee](#) website and will be updated regularly. Stakeholders are encouraged to submit additional information (e.g., compounds, analysis considerations, references, etc.) for consideration in future revisions.

## **Help Evaluate OSAC's Materials (Trace) Draft Document, *Standard Practice for Interpretation and Report Writing in Forensic Comparison of Trace Materials***

In preparation for submitting a document to ASTM for formal standards development, OSAC's Materials (Trace) Subcommittee will be conducting an interlaboratory data collection exercise to evaluate the draft of its [\*Standard Practice for Interpretation and Report Writing in Forensic Comparison of Trace Materials\*](#).

The focus of the first round of this study will be on forensic paint analysis. A web-based training session will be held **June 11, 2020 at 1:00 p.m. EDT** to introduce participants to the draft document and exercise. The time commitment for participants starts with this approximately one-hour training session and includes some additional preparation time for studying the guidance document and several hours within a selected one-week time period over the summer to complete the exercise. Participants will have 15 scenarios to work through and choose a conclusion. No data will be provided to view and evaluate; however, the summary of data and results will be shared.

The draft document can be found on the [Materials \(Trace\) Subcommittee](#) website in the Under Development section. We encourage you to start reviewing this document now, paying attention to sections 1-5 and 9 and to share this information with your colleagues.

To participate, please complete this [form](#). If you have any questions about this interlaboratory exercise, please send them to Andria Mehlretter ([ahmehltretter@fbi.gov](mailto:ahmehltretter@fbi.gov)).

## **NIST Invites Forensic Laboratories to Participate in the Cannabis Quality Assurance Program (CannaQAP)**

Does your laboratory develop quantitative methods to distinguish hemp from marijuana? Then participate in NIST's Cannabis Quality Assurance Program (CannaQAP). [CannaQAP](#) aims to help laboratories demonstrate and improve measurement comparability and/or competence for hemp determination through a perpetual interlaboratory study mechanism. Participating forensic laboratories can utilize this trusted tool to: 1) Obtain reliable quality control samples to evaluate an individual laboratory's performance and provide validation of its measurement capabilities or, 2) Elect to have their results used in lieu of formal validation studies to underpin their laboratory's purported capabilities.

CannaQAP exercises are designed to include a variety of sample types in increasing order of complexity. Laboratories are highly encouraged to participate in all exercises. Exercise 1 was designed to assess sources of instrumental method variability and exercise 2 will introduce variability of sample preparation/extraction of plant materials. The CannaQAP schedule will include multiple *Cannabis*-derived oils and plant exercises, while also incorporating extracts, concentrates, distillates, and edibles in future exercises.

EXERCISE	SAMPLE TYPE	WHEN
1	Hemp oils	June-July 2020
2	Plant (hemp and marijuana)	October 2020
3	TBD	April 2021
4	TBD	October 2021
5	TBD	April 2022

NIST is also planning to release a hemp plant Reference Material with a tentative target date of July 2021.

To participate in the CannaQAP, please contact the Cannabis/CannaQAP Team at [cannabis@nist.gov](mailto:cannabis@nist.gov). If you have any suggestions or questions regarding [CannaQAP](#) or other [Cannabis](#) projects at NIST, you can also email the Cannabis/CannaQAP Team.

### Funding Available for Standards Curricula Development

OSAC encourages stakeholders to apply to [NIST's FY2020 Standards Services Curricula Development Cooperative Agreement Program](#). This program awards funding to eligible applicants to develop undergraduate or graduate level curricula to incorporate documentary standards, standards development, and standardization information and content into seminars, modules, courses, and learning resources. **Applications must be submitted through [grants.gov](https://grants.gov) no later than 11:59 p.m. ET on June 15, 2020.**

### 2020 Call for Members for ASB Consensus Bodies

The ASB is currently accepting applications for openings in their consensus bodies. Please visit the [ASB website](#) for more information on the different consensus bodies, interest categories, and how to apply. **Applications will be accepted until July 3, 2020.**

### Get Involved with OSAC

OSAC offers a variety of ways for members, affiliates and other experts in the forensic science community to participate in the standards advancement process. Click [here](#) to learn how you can help make an impact on the forensic science community through standards.