

B190 2020 Update From the Scientific Working Group for the Analysis of Seized Drugs (SWGDRUG)

Sandra E. Rodriguez-Cruz, PhD*, Drug Enforcement Administration, Dulles, VA 20166

Learning Overview: The goal of this presentation is to provide attendees with a summary of the most recent activities and work products developed by SWGDRUG.

Impact on the Forensic Science Community: This presentation will impact the forensic science community by providing and discussing information and resources for the analysis of seized drugs.

SWGDRUG was formed in 1997 in a joint effort between the United States Drug Enforcement Administration (DEA) Office of Forensic Sciences and the Office of National Drug Control Policy (ONDCP). SWGDRUG works to improve the quality of the forensic examination of seized drugs and to respond to the needs of the forensic community by supporting the development of internationally accepted minimum standards, identifying best practices within the international community, and providing resources to help laboratories meet these standards. This presentation will provide attendees with information on SWGDRUG activities during the past year.

During the summer of 2019, core committee members approved the most recent version of the SWGDRUG Recommendations, version 8.0, which includes revisions to PART IIIB, Methods of Analysis/Drug Identification. A reliable and scientifically supported identification of a drug or chemical depends on the use of an appropriate analytical scheme by competent analysts in a quality-controlled process. The purpose of PART III B is to recommend minimum requirements for the forensic identification of such materials. PART III B addresses the overall selection of techniques, the rationale behind their categorization, and emphasizes the need to develop robust analytical schemes dependent on the scenario at hand or jurisdictional application.

A new supplemental document, SD-7 (Construction of an Analytical Scheme), was also approved during 2019. The objective of this supplemental document is to provide guidance to practitioners on the design and implementation of appropriate analytical schemes, as required by SWGDRUG Recommendations PART IIIB. It includes more than a dozen examples of analytical schemes applicable to many jurisdictions. During this presentation, some of these examples, their rationale, limitations, and applicability will be discussed.

SWGDRUG committee members are also working on revisions to PART IVA (Quality Assurance/General Practices) and PART IVB (Quality Assurance/Validation of Analytical Methods) of the Recommendations. Revisions include additional background information and clarifications on the performance characteristics to be evaluated during the validation of both qualitative and quantitative methods. Furthermore, the currently existing Supplemental Document SD-2 (Validation of Analytical Methods) is also being revised and expanded to better assist seized-drug practitioners during method validation activities. Additions include examples of how to perform and document validations for a color test, a Gas Chromatography/Mass Spectrometry (GC/MS) method, and an Infrared (IR) spectroscopy method.

This presentation will also summarize recent updates on multiple SWGDRUG resources, such as the MS library, IR library, and Drug Monographs.

The SWGDRUG core committee includes representatives from regional, national, and international forensic organizations; educators, practitioner and scientists from the United States; and representatives from the European Network of Forensic Science Institutes (ENFSI), the Academia Iberoamericana de Criminalistica y Estudios Forenses (AICEF), the Asian Forensic Science Network (AFSN), and the United Nations Office on Drugs and Crime (UNODC).

Criminalistics, Drug Analysis, SWGDRUG

Copyright 2020 by the AAFS. Permission to reprint, publish, or otherwise reproduce such material in any form other than photocopying must be obtained by the AAFS.