



### **D14 The Need for a Comprehensive and Interactive Digital Asset Management Software**

*Steven Dowell, BS\*, 2509 Olive Ave, La Crescenta, CA 91214*

After attending this presentation, attendees will gain an understanding of the increasing amount and complexity of various types of data (digital assets) that are currently part of case evidence, and a corresponding method to contain, organize, and turn these digital assets into meaningful and retrievable information.

The impact of this presentation is to provide a meaningful method to turn the increasing load of data into information and improve access to its use as corporate information for QA, QC, teaching, training, and handling data in general.

A traditional digital asset management system (document management system) is a static, non-dynamic collection of data—an electronic filing cabinet. This type of repository solution may be adequate when used to specifically replace CDs, DVDs and disconnected hard drives as a method for data storage. However, while this solution may provide a level of security, organization, and easier access to the assets, it falls well short of what the real value could be, especially in the area of forensic science and the investigative services of law enforcement.

Many agencies traditionally just implement a simple data storage (repository) solution because of the overwhelming and the ever increasing amount and diversity of data. While this is justifiable, this is—not a progressive and powerful information producer—this approach will never allow these agencies to get beyond meeting the minimum level of digital asset management required by the regulatory and accreditation bodies.

Because the digital information created in the forensic world is not static, the multiple types of information that get generated need to support the investigative process. Therefore, digital asset/evidence management software needs to provide the tools to dynamically interact with the stored digital data and turn that data into valuable case information.

There is an increasing demand placed on every department to use these case-related digital assets in an attempt to answer the evolving questions about circumstances, cause of death, nature of evidence found, etc. Forensic agencies in general would greatly benefit from dynamically interacting with digital case information not only for themselves, but to be able to pass information on to other requesting agencies.

All of these agencies are gathering and developing an ever-growing amount of interrelated case evidence and digital image assets, audio/video files, HD data, federal and international data, and reports. To the degree that the communal change to dynamic digital asset management software is delayed, necessary training of individuals in the use and creative interaction with these powerful tools is withheld. Since all the departments ultimately work together, by default, then, the whole system is held back.

As the investigative tools are learned and the overall design is understood an individual who knows the basic concept of this type of software can easily migrate from one position/department to another. For example the adoption of a unified dynamic digital asset software package with an overall comprehensive and consistent design would not only provide useful and necessary skill for daily solution of case information but would become incredibly important and necessary in providing solutions in the chaotic aftermath of data collection and association in the event of a mass disaster.

As a solution to the above circumstances, a model will be demonstrated from the point of view of a medical examiners' office in the area of an analysis of a tool mark in biological material. This demonstration will take elements of the stored digital assets, perform the required analysis of stored images, and relate relevant investigative information and autopsy data to produce a report. Additionally, the report and all data used to inform the report will be associated in the relational database area of the software and allow for QA, QC of the report. This data and all other such stored case data represents not only stored case information but is accessible corporate knowledge that can be used for teaching, training, court room presentations, proficiency testing, and a host of other administrative uses. Additionally, such comprehensive and accessible data can facilitate the distribution to and interaction with other agencies which reduces the workload to distribute such required information.

**Digital Assets, Tool Marks, Document Management**