



Jurisprudence Section - 2013

F1 Ultimate Dental Chart for Medical Examiners

William E. Silver, DDS, 10 Edgewater Dr, 5G, Coral Gables, FL 33133; Richard R. Souviron, DDS, 336 Alhambra Cir, Coral Gables, FL 33134; and Bruce A. Hyma, MD, Miami-Dade County, Medical Examiner Dept, Number One on Bob Hope Rd, Miami, FL 33136*

After attending this presentation, attendees will learn of a new dental chart that will assist dentists, medical examiners, and law enforcement officers in the proper collection of dental evidence.

This presentation will impact the forensic science community by informing forensic dentists who participate in the charting of the dentition of unknown remains in finding a complete collection of data on one chart in an organized form. This chart should enhance the ability of the dentist or medical examiner to make more accurate conclusions regarding the identification of victims or suspects whose identity has not been established.

Not all medical examiner departments have the services of an ABFO forensic odontologist available on staff. Many are fortunate to have a dentist on call that may assist in the recording of dental evidence in the case of unknown remains. Some medical examiners have to take it upon themselves or enlist the aid of a forensic anthropologist to record the dental evidence. In any case, the medical examiner's department is in need of standardization of dental charting, in the collection of dental evidence, at the time of the dental autopsy. This chart should be clear, as well as comprehensive, and lead the investigator in the correct direction. Another important element is the ability of every satellite medical examiner's department and investigative agency to read and understand what has been recorded by their colleagues. Every medical examiner's department, as well as every dentist, has his/her own charting system, which only contributes to the confusion and the inaccuracy of dental charting. Standardization of dental charting should lead to easier computerization of dental charting in the distribution of evidence among missing and unidentified persons. Standardization also leads to better communication when we are all reading from the same page. This presentation of a dental chart contains the ultimate in knowledge required for a complete dental examination. The Universal Tooth Numbering system, as well as the Federation Dentaire Internationale (FDI) system, are both employed in the permanent as well as the deciduous dentitions. Both systems are the most common means of reference nationally and internationally, and both systems are found in close proximity to the teeth being recorded in this chart. The Universal Tooth Numbering system is in use practically throughout the United States and is the standard system taught in dental schools in this country. The FDI Tooth Numbering System is most popular throughout the rest of the world and is an important element contained within this chart. Although Canada and INTERPOL rely on similar systems, it would be advisable to coordinate these systems into one compatible system that would not rely upon language specificity but would have a more universal appeal and character.

The coding for the identification and condition of individual teeth is charted by the WIN ID system. Although this may be the most popular system, it is not universally employed throughout the world. An odontographic representation of all teeth is available on the front of the chart to note the outline of restorations and/or special conditions. This is the same system used by National Disaster Medical System teams and is easily converted into NCIC codes, which is the system used by the U.S. Department of Justice and the Federal Bureau of Investigation. All WIN ID and NCIC codes are defined within the body of the dental chart. There is a guide to the standard series of dental radiographs and a recommended outline for dental photographs available on the back of the chart.

In addition, there are areas on the chart to note the Classification of Occlusion and a Classification of Remains. Separate areas allow for remarks, dentures, and pathology. The front of the chart contains space for the possible name, age, sex, race, medical examiner, number, and date, together with an area for the signature and license number of the examining odontologist.

Ultimate, Dental, Chart