

# Meeting Report

## The American Academy of Forensic Sciences

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The American Academy of Forensic Sciences (AAFS) 49th Annual Meeting was held in New York City at the Marriott Marquis Hotel, February 17-22, 1997. The Annual Meeting was comprised of workshops, scientific sessions, poster presentations and vendor exhibits representing various forensic disciplines, including DNA analysis. Over 1,500 scientists attended and 80 companies exhibited.

The "1997 Advanced DNA Technologies Workshop: Automation and Application" was held one day prior to the start of the Annual Meeting. The workshop was attended by over 250 scientists, a clear indication of the growing interest in the use of DNA testing in forensic science. The workshop, organized and chaired by Dr. Steven Lee of the California Department of Justice DNA Laboratory, was divided into three sessions: automation strategies, applications, and forensic DNA biotechnology company presentations. Topics covered under automation strategies included high throughput, automated instrumentation, microchip PCR and detection, and matrix-assisted laser desorption ionization time-of-flight mass spectrometry (MALDI-TOF MS). In addition, new genetic loci were also reviewed. The second session covered STR casework, data banking and STR standardization. The final session focused on recent developments from various biotechnology groups developing new STR multiplexes and automation strategies.

The General Session included topics such as DNA purification, STR multiplexes and new technologies. The presentations on DNA

purification covered the use of automation as well as DNA extraction from unusual sources such as drinking straws and toothbrushes. New STR loci and multiplexes were described in several talks. New technologies being developed included Genetic Bit Analysis and Sequence Specific Oligonucleotide Probe (SSOP) for analysis of mitochondrial DNA and for detection of polymorphisms for HLA class II antigens.

Among the high points of the meeting were several presentations by various members of the FBI study group that is now evaluating loci for inclusion in the CODIS database. This multi-laboratory group, led by Dr. Bruce Budowle of the FBI, will choose the loci to be used as the 'core' loci for this nationwide DNA database. Once this process is completed, the building of the CODIS database will see rapid growth in STR-analyzed samples. Eventually, that database will include DNA samples from millions of convicted felons. As such, it represents a watershed event in DNA testing in forensics and the dawn of a new age in criminal investigation. Specifically, Dr. Budowle discussed a current study which is evaluating STR loci and multiplexes. He showed how the study was progressing to choose loci and to develop protocols for their use. The study group has been working closely with manufacturers who are designing their products to meet this need. The study has clearly shown that the various STR multiplex reagents are the reagents of choice for inclusion in this database.

### *Upcoming Meetings*

#### **CALIFORNIA ASSOCIATION OF CRIMINALISTS**

May 27-31, 1997

Sacramento, California

Contact: Ann Murphy  
(916) 732 3840

#### **SOUTHERN ASSOCIATION OF FORENSIC SCIENTISTS**

September 4-6, 1997

Longboat Key, Florida

Contact: Michael Healy  
(941) 747 3011  
ext. 2280