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**July 1988** 

### **CONFERENCES AND SEMINARS**

#### SOUTHWESTERN ASSOCIATION OF FOREN-SIC SCIENTISTS - 10th ANNIVERSARY MEET-ING

August 2 - 5, 1988

The 10th anniversary of SWAFS will be celebrated in Austin, Texas, during the meeting from August 2 through August 5. The meeting will be held at the Embassy Suites Hotel, and will feature workshops on photomicrography, DNA typing, the Frye standard and advance interpretation of mass spectra. For further information, contact Brian Edmiston, DPS Crime Lab, Austin, Texas 78765. (512) 465-2105.

## ACS - DIVISION OF CHEMISTRY AND THE LAW

September 26 - 27, 1988

As part of the Fall national meeting of the American Chemical Society, the division of Chemistry adn then Law will hold two symposia: On Monday, September 26, the symposium will be entitled "The Application of Forensic DNA Technology and the Frye Standard", and on Teusday, Septemebr 27, the symposium will be entitled "Forensic Laboratory Accreditation and Certification of Technical Pesonnel. For further information, contact Mark Farley, Law offices of Pennie and Edmonds, 1155 Avenue of the Americas, New York NY 10036, (212) 790-9090.

## SOCIETY OF FORENSIC TOXICOLOGISTS - 1988 MEETING

September 28 - October 1, 1988

The 1988 SOFT meeting will be held in Philadelphia at the Hershey Hotel. For further information, contact Jane Speaker, 2112 Cherry Street, Philadelphia PA 19103.

# NORTHWEST ASSOCIATION OF FORENSIC SCIENTISTS - FALL 1988 MEETING

October 11 - 14, 1988

The FAII NWAFS meeting will be held at the Portland Marriott Hotel. Workshops are planned in blood spatter interpretation, and blood alcohol absorption/dissipation. For further information, contact Beth Carpenter, OSP Crime Lab, 111 2nd Avenue, Portland OR 97204. (503) 229-5017.

#### ANNUAL CONFERENCE

CANADIAN SOCIETY OF FORENSIC SCIENCES

October 19 - 21, 1988

The annual CSFS Conference will be held OCtober 19 - 21, 1988, at the Westbury Hotel in Toronto, Ontario. The theme of the meeting is

"Advances in Technology: The Impact on Forensic Science." For further information, contact the Canadian Society of Forensic Science, 2660 Southvale Crescent, Suite 215, Ottawa, Ontario Canada K1B 4W5. Telephone (613) 731-2096.

#### 14th ANNUAL MEETING OF THE NORTH-EASTERN ASSOCIATION OF FORENSIC SCIENTISTS

October 21-22, 1988

The 14th annual NEAFS meeting will be held at the Mystic Hilton in Mystic, Connecticut. For further information, contact Steve Sottolano, Drug Enforcement Administration, Northeast Laboratory, 555 West 57th Street, Suite 1886, New York NY 10019. (212) 399-5137

# 41ST ANNUAL MEETING OF THE AMERICAN ACADEMY OF FORENSIC SCIENCES

February 20-25, 1989

This conference will be held at the Riviera Hotel, Los Vegas, NV. Contact AAFS, 225 South Academy Blvd., Colorado Springs, CO, 80910. (303) 596-6006.

# NORTHWEST ASSOCIATION OF FORENSIC SCIENTISTS - SPRING MEETING

(date to be announced)

The Spring, 1989, NWAFS meeting will be hosted by the Federal Forensic Wildlife Laboratory in Ashland Oregon.

# INTERNATIONAL SOCIETY FOR FORENSIC HEMOGENETICS

October 18 - 20, 1989

The 13th International Congress of the International Society for Forensic Hemogenetics will be held in New Orleans, LA, from October 18 through 20, 1989. For further information, contact Dr. Herbert Polesky, Memorial Blood Bank Center Minneapolis, 2304 Park Avenue South, Minneapolis MN 55404.

# PAN AMERICAN ASSOCIATION OF FORENSIC SCIENCES

November 1989

The Fourth International Meeting of the Pan American Association of Forensic Sciences will be held in Bogota, Columbia. The theme of the meeting is "The Sciences and Justice." For further information, contact Dr. Egon Lichtenberge, Carrera 11 A 96-26, Bogota, Columbia.

### JOB OPENINGS

(Job openings are obtained from a variety of sources. Given publication deadlines and delay in receiving announcements from other parts of the country, some of the openings announced here may be filled by the time this Newsletter is received. Job announcements will normally be run only one time. Members actively seeking employment are encouraged to contact the editorial secretary for information about openings which become available between newsletters.)

#### CRIMINALIST

#### SENIOR CRIMINALIST

The County of Los Angeles has several openings at the Criminalist and Senior Criminalist levels. Qualifications include a Bachelor's degree in Criminalistics, Chemistry or a closely related field. The Senior Criminalist position requires two years experience in a forensic science laboratory. The salary range in \$2286 - \$2836/month (Criminalist) or \$2913 - \$3608/month (Senior Criminalist). For further information, contact Harley M. Sagara, Sheriff's Department, Scientific Services Bureau, 2020 West Beverly Blvd., Los Angeles CA 90057.

#### IDENTIFICATION TECHNICIAN

The County of Sacramento has openings for experienced fingerprint identification technicians. The positions require two years experience in the comparison and identification of latent prints, or experience in law enforcement identification work which included fingerprint classification. The salary range is #2069 - \$2514/month. Four further information, contact Sacramento County Employment Office, 710 J Street, Sacramento CA 95814, (916) 440-5593.

ASSISTANT CRIMINALIST CRIMINALIST

The City of San Diego has an opening at the Assistant Criminalist or Criminalist level. Criminalist position requires a Bachelor of Science Degree in Criminalistics, Forensic Science, or a biological or physical science and two years experience as a criminalist or toxicologist. The Assistance Criminalist position requires a Bachelor's Degree in Criminalists or Forensic Science, or a degree in a biological or physical science with one year experience as a The salary range is \$2524 criminalist. \$3056/month (Assistant Criminalist) and \$3056 -\$3692/month. For further information, contact City of San Diego, City Administration Building, Employment Information Counter, 202 C Street, San Diego CA 92101 (619) 236-5753.

#### **DOCUMENTS EXAMINER**

The City of San Diego is looking for qualified applicants for the position of Document Examiner. The job requires two years of experience as a document examiner in criminal investigations and having given testimony in court as an expert witness. The salary range is \$2917 - \$3526/month. For further information, contact Gerald Chiles,, City Administration Building, 220 C Street, San Diego CA 92101, (619) 236-6400.

#### CRIMINALIST

The Oregon State Police Crime Laboratory is seeking applicants with at least three years experience in serology or trace evidence examination. The salary range is \$24,000 to \$36,000 per year. For additional information, contact Roger H. Dingeman, Oregon State Police, Crime Laboratory Bureau, 1111 S.W. 2nd., Portland OR 97204. (503) 229-5712.

### POSITIONS WANTED

A Criminalist with the Home Office Forensic Science Laboratory, Huntingdon, is seeking a position in the U.S. Three years of experience in a forensic laboratory. Contact Ray Palmer, 4 Roscrea Terrace, Huntingdon, Cambridgeshire PE18 6DE.

### **SPRING 1988 MEETING**

# THE NORTHWEST ASSOCIATION OF FORENSIC SCIENTISTS

MISSOULA, MONTANA

MARCH 14-18, 1988

"Contamination Problems with Polyester Bags (Kapak / Scotchpak)" William R. Dietz, ATF and Dale C. Mann, WSP Crime Lab-Seattle

A contamination problem with polyester bags was accidentally discovered during the analysis of fire debris for the presence of accelerants. The discovery came about after debris, stored and analyzed in metal cans, was transferred into polyester bags. While the portions of debris in the metal cans failed to reveal the presence of accelerants, the portions of debris in the plastic bags revealed the presence of a medium petroleum distillate, similar to Wizard Charcoal Lighter fluid. Suspicion was raised further when fire debris, which should not have contained Wizard Charcoal Lighter fluid, was store in polyester bags and analyzed to find it present.

Various shipments of bags were analyzed to find the medium petroleum distillate in several of them. Contacts with Kapak and 3M companies have indicated the contamination originated in the manufacturing of the plastic. No assurances have come forth to indicate the problem has been alleviated.

"Applications of Forensic Science in the US and USSR"

Ilya Zeldes, South Dakota Crime Lab

"Trace Evidence Analysis by FTIR Microscopy" John Reffner, Spectra-Tech

"Clandestine Methamphetamine Synthesis and Safety"

Margaret Stevenson, Charles Hall and Roger Ely - DEA San Francisco Laboratory

The reaction mechanisms for the synthesis using phenylacetic acid, sodium acetate and acetic anhydride; and for phenylacetic acid and lead diacetate are presented. Several major reaction by-products are discussed, and the conditions

which will give rise to the contaminants are presented.

The reaction mechanism for the classical reductive amination of Phenyl-2-propanone to methamphetamine is presented along with several reaction by-products. The reaction mechanisms for the synthesis of methamphetamine via ephedrine is also presented, along with the stereochemistry of producing optically pure methamphetamine.

A discussion of the DEA Clandestine Laboratory Safety Class is presented.

"Forensic Applications of Plasma Spectrometry" Robert Koons, FBI Research Facility, Quantico, VA

Reported applications of atomic emission spectrometry using a variety of plasma sources have increased dramatically in the past few years. Among the attributes of plasma emission spetrometry which have contributed to its wide acceptance are its multielement capability, relative freedom from chemical interferences, wide linear dynamic ranges, ability to dtermine a wide range of elements including refactories, and good precision and accuracy even at relatively low concentrations. General legal acceptance, particularly in the environmental area, and widespread availability of commercial instruments make it likely that plasma spectrometric methods are about to move from being a research technique to a bench-level tool in the forensic laboratory. This talk presents an introduction to the methods, using inductively coupled plasma-atomic emission spectrometry as an example, and an overview of the instrument considerations specific to forensic samples. The need for precise multielemental analysis of small samples or dilute solutions in forensic situations places limitations on the instrument which must be considered in selecting among the available instrument configurations. The ability to make background and inter-element corrections in a wide variety of generally unknown sample matrices requires flexibility and high resolution in spectrometer design. Sample introduction should allow for small solid samples, hydride generation, and flow injection techniques. Applications which have been reported in the literature will be discussed, including multi-element analysis of glass, metals, single-layer paint fragments, precious metal ores, detection of gunshot residues and toxic metal screens.

"Identification of Skeleton Missing Skull and Hands"

Dr. Charline Smith, University of Montana Anthropology Department

"New TLC Verification Procedure Employing Reverse Phase TLC" Peggy Eide, Marion Laboratories

"Handling the Media" John Camper, Montana Dept. of Administration, Professional Development Center

"Iso-Electric Focusing Technique Applied to Electrophoresis in Forensic Serology" Dale Dykes, War Memorial Blood Bank

"Poppies Will Make Them Sleep - Dorothy Never Knew What Hit Her" Gary Knowles, OSP Crime Lab - Medford The wicked witch of the West planted a narcotic barrier across the path of Dorothy and her friends on their way to Oz. As this presentation suggests, there are more than one species of poppy which could have been used to render the animal and human members of the band doped. There are approximately 110, academically argued, species of Papaver and over 600, even more argued, varieties. In 1986 the Southern Oregon area 'blossomed' with the blooms of opium poppies. Submissions to the Medford Crime Lab represented over 5000 plants. This paper shows trends of abuse and the occurrence of controlled substances of several poppy species.

"Survey Proposal for Combing Evidence In Sexual Assault Cases: Probative or Unwarranted Use of Time" Rex Riis, South Dakota Crime Lab

This survey is to be submitted to the NWAFS labs involved with sexual assault combing evidence and it will be used to obtain methods, procedures, policies and techniques dealing with combing evidence. The purpose of the survey is an attempt to maximize efforts and efficiencies when managing combing evidence cases. The survey format will sample ten sexual assault cases and the lab results from each of the NWAFS labs who choose to participate.

### FSI Subscriptions

Individual subscriptions to <u>Forensic Science International</u> are available at the discount rate of \$90.00 per year through the CAC. If you are interested in a subscription to <u>Forensic Science International</u>, send a check for CAC Treasurer Dan Gregonis, San Bernardino County Sheriff's Office, P.O. Box 1557, San Bernardino CA 92402. Current subscribers through the CAC should be contacted about their renewal in September. If you do not receive a renewal notice from the CAC, contact Dan.

# Drug Study Group

### Northern Section

#### Ken Fugii

Contra Costa Sheriff's Office Laboratory

A Drug Study Group meeting was hosted by the Contra Costa County Sheriff's Criminalistics Laboratory on April 14, 1988, in Martinez.

J.J. Nunez and Kevin Wood were invited to discuss the newly formed BNE/DEA Bay Area Drug Lab Task Force. The Task Force processes drug lab scenes, following the DOJ/DEA Clandestine Laboratory Manual of Instruction and Procedure, including disposal of hazardous chemicals.

The Task Force must participate in the case investigation or they will not respond to the drug lab scene. Their focus in the safe processing of the drug lab. Other aspects of the case are the responsibility of the local agency.

Their response area includes the counties of San Francisco, San Mateo, Alameda, Contra Costa, Solano, Napa, Marin, Sonoma and Mendocino. They may also respond to Humboldt and Del Norte Counties if it is a DEA case.

The Task Force has a new van fitted to accommodate all their equipment. The van was displayed at the meeting.

A slide presentation demonstrated their protocol in action at recent drug lab scenes.

The Task Force can be contacted through:

DEA .. (415) 556-7345 or (213) 894-4800 (24 hour)

BNE .. (415) 557-2955 or (415) 557-3121 (24 hour)

Ken Fugii and Lansing Lee reported on the FBI/DEA International Symposium on the Forensic Aspects of Controlled Substances. Abstracts were distributed.

#### Recent Casework

#### DEA-SE

- A recent Fentanyl Lab

- Heroin via Boron trifluoride conversion

- 4 methyl-amenorex (Euphoria) via phenylpropanolamine, Sodium Acetate and Cyanogenbromide.
- P2P via Benzene, Aluminum Chloride and Chloroacetone
- Chubaka Dark
- Heroin smuggled inside Koi carp
- A Fentanyl Synthesis involving plexiglas as a starting material.

Alameda County:

- 30 to 40 grams of Methaqualone as a tan pow-
- mixture of MDA and MDMA

#### Oakland P.D.:

- Ketamine
- Increase in tar heroin submissions, also balloons of brown powder heroin.

#### DOJ - Eureka:

- Rocks of cocaine hydrochloride
- 4 Bromo 2,5 dimethoxy N Benzenethanamine in a mason jar and in capsules. Marquis, Mecke and Froehde give a greenbrown. Identified against Georgia State Crime Laboratory IR Library.
- MDMA, light blue with brown specks, compressed tablets, thought to originate from the Bay Area.

A joint meeting of the Northern and Southern Drug Study Groups was held at the CAC Spring 1988 Seminar in Berkeley on May 20, 1988.

Professor Walter Jennings, co-founder of and consultant to J&W Scientific, lectured on capillary gas chromatography and its applications to drug analysis. He presented a wealth of information about chromatographic techniques and selection of instrument parameters.

Mr. Dean Rood, Technical Support chemist at J&W Scientific was also present. Together they answered questions following the presentation and later at Hs. Lorships here they joined the

banquet as guests of the Drug Study Groups. Mr. Rood invited calls to their technical support group at (916)985-7888.

The 1988 Uniform Controlled Substances Act is available from BNE in Sacramento. Contact Special Agent in Charge Warren H. Morgan (916)739-3283 or if you can wait until the next Northern Drug Study Group meeting copies will be available then.

### CAC MERCHANDISE

Show your colors (or colours) - at home, at work or at play. Be the first (and probably the only) person on your street to have one of these. Limited stocks on hand at CAC Seminars and by mail (via John DeHaan Calif DOJ - Sacramento). Special order items and colors available on request. All CAC clothing items bear a specially embroidered emblem. These goodies are offered to you at cost, so you won't find a better deal.

The current offerings are listed here, if you would like to see a particular product offered, contact John DeHaan or Sue Swarner (Contra Costa County lab).

Sweatshirts- various colors (50/50 blend): \$12.00

Hats (one size fits all, mesh and foam, various colors with white: \$5.50

Mugs: Glazed ceramic mugs: \$4.50

Name Badges: Custom engraved (name & agency): \$5.00

Patches: CAC logo only, black-on-white: \$5.00

Golf Shirts (Hanes Cotton-Polyester, short sleeve): \$15.50 Available in: black burgundy, slate grey, eccru, navy, kelly green, red, yellow, light blue, siler and white

Sweaters (long-sleeve acrylic pullovers): \$17.50

Vest (sleeveless acrylic pullovers: \$16.50

Sweaters or vests available in: black, brown, burgundy, tan (camel), light blue, red and navy. (100% Orlon available at extra cost)

Tote bags (natural canvas tweed): \$9.00

Forensic Science Society

<u>Ties</u>: Embroidered FSS motif: \$6.50 (navy brown, burgundy) Woven multiple scale/microscope motif: \$.500 (burgundy)

Plagues: \$20.00

Pin Badges: \$3.00

### Publications Available from the CAC

Forensic Science Foundation:

Explosion Investigation, Yallop \$25.00

Science Against Crime, Kind/Overman

World List of Laboratories \$20.00

Eight Peak Index of MS \$65.00

Measurement of Breath Alcohol \$13.00

Bibliography on Ethyl Alcohol, Holleyhead \$25.00

Sources and Origins \$8.00

The Scientific Investigation of Crime, Kind \$40.00

(Note: The psecial price of \$40.00 for <u>The Scientific Investoigation Crime</u> is available only until October 1. Please send your order, with payment, to John DeHaan.)

# BFS-CAC-UNISYS Forensic Serology Symposium Report Now Available

The report of the 1987 Symposium on the Practice of Forensic Serology, co-sponsored by the California Department of Justice- Bureau of Forensic Services, the California Association of Criminalists, and the Unisys Corporation is now available. This report contains the documents produced by the five working groups:

- 1. Quality Assurance
- 2. Standards of Training
- B. Recording, Collection, and Preservation of Physiological Stain Evidence
- 4. Method Evaluation
- 5. Interpretation and Reporting of Results

This report is available for \$15.00. If you would like a copy of the report, send a check payable to the CAC to

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