

Curriculum Vitae

Michael J. Spence, Ph.D.

Forensic DNA Consultant-Spence Forensic Resources

2455 E. Missouri Ave. Suite A, Las Cruces, NM 88001

Office: 575-556-8513, Cell: 575-640-2360, Fax: 575-556-8510

Website: spenceforensics.com E-mail: mike@spenceforensics.com

Educational Background:

<u>Institute and location</u>	<u>Degree</u>	<u>Conferred</u>	<u>Field of Study</u>
New Mexico State University Las Cruces, New Mexico	Ph.D.	Dec., 1990	Molecular Biology
University of Texas El Paso El Paso, Texas	M. S.	Dec., 1985	Applied Microbiology
University of Texas El Paso El Paso, Texas	B. S.	Aug., 1983	Applied Microbiology

Professional Experience in Forensic Biology:

2/08-Present: Forensic DNA Consultant, Spence Forensic Resources, Las Cruces, NM

6/07-2/08: Technical Manager, Forensic Testing Laboratories, Las Cruces, NM

5/03-5/07: Forensic Biologist, Indiana State Police, Evansville Regional Laboratory

Summary of Forensic Training:

- **Spence Forensic Resources (SFR)**: Founded forensic biology/DNA consulting company. SFR provides a range of services including examination of case reports and all supporting documentation, as well as consulting and expert witness testimony at criminal case hearings, depositions, and trials.
- **Forensic Testing Laboratories**: Development of a Quality Assurance Policy in preparation for a pending accreditation process with FQS-I assessors. Design and validation of Standard Operating Procedures and worksheets for documentation of Chain of Custody, Evidence Screening, DNA extraction/purification, real-time PCR quantification, STR-based DNA typing, statistical data interpretation, case report writing, and case review. Preparation of Forensic Biologist training manuals, including a strategy for competency/proficiency testing. Interviewing prospective new employees. Work with local law enforcement investigators on preliminary, non-probative cases.
- Applied Biosystems Instrument Training-3130 Capillary Electrophoresis, 7500 Real-Time PCR and newly released Quantifiler Duo DNA Quantification System, January 28-29, 2008.
- Promega Corporation demonstration and training on the use of PlexorHY Real-Time PCR Quantification System, February 1-2, 2008

- **Indiana State Police Laboratory:** Evidence Screening/DNA Proficiency Training Program. Training included the following: chain of custody, evidence handling and screening for biological material, presumptive and confirmatory testing for blood, semen, saliva, human origin testing, comparative hair analysis, DNA extraction and purification, slot blot-based and real-time PCR-based DNA quantification systems, Promega PowerPlex16-based typing of DNA, statistical assessment of single-source and mixture DNA profiles. Training and mock cases were used to emphasize preparation for courtroom testimony. Case report writing and technical review of reports prepared by associated forensic biologists.
- **DNA Technical Auditor-National Forensic Science Technology Center (NFSTC):** Texas DPS Crime Lab-Austin; TX, Fort Worth Police Department Crime Lab; Univ. of North Texas-Center for Human Identification; Tarrant County Medical Examiner; Baltimore City Police Dept. Crime Lab; Kansas City Police Crime Lab; Florida Department of Law Enforcement Regional Labs in Tampa and Orlando, FL; Laboratory Corporation of America, Burlington, NC; North Carolina Department of Crime Control and Public Safety, Raleigh, NC.
- Indiana State Police proficiency training-Applied Biosystems Real-Time Polymerase Chain Reaction Process, completed December, 2006
- Training on the use of the JusticeTrax Laboratory Information Management System, September 2006
- Federal Bureau of Investigation DNA Auditing Training Workshop and Certification, Fredericksburg, VA, July 2006
- Bode Technology Workshop: Advances in Human Identification, San Diego, CA, April 2006
- SPEX Forensics Alternate Light Source Crime Scope Training, November 2005
- Applied Biosystems Training for Capillary Electrophoresis and Real-Time Polymerase Chain Reaction Processes, August 2005
- Statistics-Forensic Biology Applications Training, November 2004
- Statistics Workshop presented by Charles Brenner, Ph.D., March 2004

Crime Laboratory Examinations: Evidence Screening and DNA Casework:

Over 100 cases completed

Technical Review of DNA Cases and Recent Notable Case Successes:

Estimated total number of case reviews for either the prosecution or the defense: 325+

State of New Mexico v. Juantio Becenti, November 28, 2008 testimony, Aztec, NM: Counsel for prosecution withdrew from the case prior to jury deliberation.

State of Maryland v. Larry Wooden, March 3, 2009 trial, Baltimore, MD: Counsel for prosecution decided to eliminate all biological/DNA aspects of the case. Defendant was subsequently found not guilty of first and second degree murder. Jury found defendant guilty of gun possession.

U.S.A. v. Seth Hornedeagle, April 9, 2009 testimony in U.S. Federal Court, Las Cruces, NM: Defendant found not guilty on all counts and immediately released.

State of New Mexico v. Fernando Coyazo, May 8, 2009 testimony, Alamogordo, NM: Defendant was found not guilty on all counts and immediately released.

State of Maryland v. Gary Leon Holloway, March 9, 2010 trial, Frederick, MD: Attempted homicide case was dismissed due to questionable eye witnesses and misinterpretation of DNA results.

Expert Witness Experience:

Testimony in a total of twenty-five criminal proceedings.

Testimony at fifteen trials, all for the prosecution: All occurring in the state of Indiana.

Testimony at ten additional proceedings, all for the defense: Six trials in the state of New Mexico (10/28/2008, 04/08/2009, 04/09/2009, 05/08/2009, 07/17/2009, and 08/05/2009); One Daubert hearing in the state of New Mexico (05/11/2010); Two trials in the state of Texas (10/06/2008 and 03/03/2010); One trial in the state of Maryland (03/31/2009).

Professional Experience in Research:

12/94-4/03: **Assistant Scientist, Boise V.A. Medical Center, Boise, Idaho.**

Summary of research: Employed four years as a Postdoctoral Research Assistant. Secured funding for an additional five-year independent research project focusing on oncostatin M (OSM). OSM is an anti-cancer cytokine produced by activated T-lymphocytes, monocytes, and macrophages. The OSM research program incorporated contributions from nine undergraduate fellowship students and two graduate technicians. Served five years as Chair of the Boise V.A. Medical Center Research Service Biosafety Committee.

1/91-11/94: **Postdoctoral Research Assistant, University of Vermont School of Medicine, Department of Molecular Genetics, Burlington, Vermont.**

Summary of research: Mammalian cell molecular genetic studies focusing on endoprotease-mediated protein processing.

Teaching Experience:

December 2006: **Visiting Presentation: Southern Indiana Technology Career Training Center.** Provided forensic biology presentations to two classes composed of approximately sixty junior/senior level high school students.

February 2006: **Visiting Presentation: Riley Children's Hospital of Indianapolis.** Provided a training presentation to twenty-five sexual assault nurse examiners. Discussion focused on optimal collection and preservation of evidence associated with sexual assault kits. The presentation also summarized the state of advancing technologies in evidence screening and DNA typing.

Fall 2002 Semester: **Adjunct Faculty Instructor: Boise State University.** Worked on a team-taught course organized by Dr. Cheryl Jorcyk, Department of Biology, Boise State University. This course was entitled: Introduction to Bioinformatics. Presented a section entitled: "Data Mining: DNA Microarrays & Cluster Analysis".

Spring 1993 Semester: **Postdoctoral Teaching Assistant, Univ. of Vermont Dept. of Molecular Genetics.** Participated in teaching a graduate course in Mammalian Cell Molecular Genetics.

8/88-5/90: **Doctoral Teaching Assistant, Department of Biology, New Mexico St. University.** Two semesters teaching Cell Physiology Lab, one semester General Biology Lab.

8/83-12/85: **Master's Teaching Assistant, Department of Biology, Univ. of Texas at El Paso.** Five semesters teaching General Biology Labs.

REFERENCES

Jeff Gilleran
Chief, Forensics Division
Maryland Office of the Public Defender
201 E. Baltimore St., Suite 1610
Baltimore, MD 21202
410-223-3783
jgilleran@opd.state.md.us

Carl Sobieralski
DNA Supervisor and State Technical Leader
Indiana State Police Laboratory
Indianapolis, IN 46202
317-921-5400 or 317-921-5339
csobieralski@isp.in.gov

Joe Vetter
Laboratory Manager
Indiana State Police-Evansville Regional Lab
Evansville, Indiana 47725
812-867-3157
jvetter@isp.in.gov

Steve Aarons
Aarons Law Firm, P.O. Box 1027
300 Catron Street, Suite A
Santa Fe, NM 87504-1027
505-984-1100
aar954@gmail.com

Karl Reich, Ph.D.
Independent Forensics, Inc.
4600 Roosevelt Road, Suite 201
Hillside, IL 60162
708-234-1200
karl@ifi-test.com

Michael Rosenfield
Asst Public Defender, Capital Crimes Unit
New Mexico Public Defender
505 Marquette Ave NW
Albuquerque, NM 87102
(505) 841-5187
michael.rosenfield@state.nm.us

Anthony White
White Law Firm
15535 Solana Road SE
Deming, New Mexico 88030
575-544-3743
blanconm@zianet.com

Thomas S. Hughes
Hughes Law Firm
747 E. San Antonio
El Paso Texas 79901
915-532-4984
thugheslaw@aol.com

Dan Shaffer
Colorado Alternate Defense Counsel
359 Colorado Avenue, Suite 204
Grand Junction, CO 81501
970-243-2552
lawyerdan@danielshafferlaw.com

Herve Gambliel, Ph.D.
Boise V.A. Medical Center
500 W. Fort Street
Boise, Idaho 83702
208-422-1000, Ext. 7653
herve.gambliel@va.gov