



ToxTalk

The official publication of the SOCIETY OF FORENSIC TOXICOLOGISTS, INC.

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REGULAR FEATURES

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SPECIAL INTEREST

Preliminary SOFT 2001 Annual Meeting Information
2001 Committees and Chairs

INSERTS

ERA Call for Candidates (*please post*) ☼ 2001 SOFT Meeting Forms

SOFT 2001 NEW ORLEANS September 30 – October 5

Radisson Hotel

ToxTalk is mailed quarterly (bulk mail) to members of the Society of Forensic Toxicologists, Inc. It is each member's responsibility to report changes of address to the SOFT mailing address (Mesa, AZ - above). Non-members may now receive ToxTalk for \$15 per calendar year. Make your check payable to SOFT and mail it directly to the ToxTalk Editor.

DEADLINES: Feb. 1, May 1, Aug. 1, and Nov. 1.

NEXT DEADLINE: MAY 1, 2001

PRESIDENT'S MESSAGE by Michael L. Smith, Ph.D., DABFT

I greatly appreciate the opportunity to lead SOFT over the next year and the confidence that you have placed in me. Each President wants to leave some legacy from their year in office, and I hope one of mine is that my presidential messages are short and to the point.

One of the best Society benefits we, the members of SOFT, give ourselves is the annual meeting. The meeting this year in New Orleans is already on its way to being an outstanding educational and social event. Check out details included with this issue of **ToxTalk** and on the SOFT website. Pat Pizzo and her team are hard at work. Leon Glass has relevant workshops lined up and Joe Manno, et al., are putting together an incredible scientific program. The Voodoo Workshop will be fun and allow all of us important time to get to know each other in a less formal setting. New members, if you haven't attended a SOFT meeting, get prepared for the Elmer Gordon Open Forum on Thursday evening. This is one of our traditions. We all congregate in a room for an informal exchange of ideas. Don't be surprised if our colorful MC, Chip Walls, makes you feel comfortable enough that you find yourself standing next to one of the legends of toxicology expressing your opinion. Don't miss this meeting.

Jennifer Limoges has been appointed as the new Chair, Continuing Education Committee. She would like for me to pass on that the location and subject of the next toxicology course, offered regionally for local analysts and other scientists, will be announced in the near future in **ToxTalk**. Previous courses, *The Effects of Alcohol & Drugs on Human Performance* and the *Chemistry of Derivatization*, were great successes. I attended each when they came to my area and they were excellent and inexpensive.

Tim Rohrig, guest editor, and Christine Moore, Adam Negrusz and Lance Presley, associate guest editors, have solicited research manuscripts for the SOFT/JAT Special Issue. You have received a "call for papers" with your previous issue of **ToxTalk**. At the time of this writing submissions were going well with a number of manuscripts from members who wished to share their research results with all of us. Be prepared to receive another excellent series of articles on postmortem, human performance and drug testing toxicology in this Special Issue when it is available at the meeting in New Orleans.

Lauren Marinetti, Martha Burt and Diane Boland received ERA awards at the last meeting. This included \$1,000 toward paying for attending the meeting and the prestige of having their work recognized as outstanding science. Congratulations again! Barbara Manno and her team are already soliciting applications for the next meeting. Check for details in this edition of **ToxTalk**.

I would like to personally thank Steve Wong, Sue Gock and the Milwaukee team for the many hours of intense work putting together the last SOFT Meeting. It was sensational with many new areas of science that are integrated with toxicology for all of us to think about. I think many of us will be educating ourselves in pharmacogenetics and real time magnetic resonance imaging to stay on the cutting edge of our profession. For members who want to help with a meeting or with the work of committees, please contact the appropriate person listed below. Your Board of Directors is also listed in this edition of **ToxTalk**. Contact them if you have questions or want to offer a suggestion.

Joe Monforte, that hard working editor of **ToxTalk**, has been reminding all of us over the years to send educational items, case reports, scientific inquiries, etc for publication in **ToxTalk**. I know I've had cases, unknown compounds, drug trends I noticed in our work, etc. in the past and felt I was too busy to submit them or compiled them into a research study for publication in the *Journal of Analytical Toxicology*. I should have sent many of them to Joe. My New Year's resolution is to do better. **ToxTalk** is a great forum to get your observations out quickly and get quick feedback. It also lets all of us know what you have seen so we can be on the lookout. Joe has some new ideas about soliciting and compiling this kind of information. Check them out in this edition.

Secretary Jenkins asked me to remind everyone who has changed addresses during the year to send your new address to the SOFT Administrative Office. The SOFT Administrative Office contact information is on the front page of **ToxTalk**.

Some of you, selected at random, have already received an email from me asking for your opinion about what SOFT does to help you in your profession and what we can do to improve. For those who haven't, don't be surprised if you get one later this year. If you don't have an email address listed in the directory, call me or approach me at the annual meeting in New Orleans and let me know what you think. I put all comments in an Idea File and will present your thoughts to the Board. All ideas are considered.

Looking forward to a great year.

SEE YOU IN NEW ORLEANS! ☺

President Smith welcomes your comments and suggestions.
Contact him by phone at (703) 693-1917 or e-mail: msmith@mail.policy.osd.mil

FROM THE EDITOR'S DESK . . .

Joseph R. Monforte, Ph.D., DABFT

NEW (OLD) E-MAIL: Please note that the appropriate e-mail for **ToxTalk** Editor Joseph Monforte is **DrMonforte@aol.com** - an alternate is **monforte@juno.com**; however, the juno address does not get checked often.

PROMISING TOXTALK ADDITIONS: Following the last SOFT annual meeting, I had several offers to assist with **ToxTalk**. I am grateful for the offers, and I assure all who have volunteered that they will be contacted. You will see names of some new contributors in this issue.

I want to specifically bring to your attention a new feature in this issue of **ToxTalk**. Dan Anderson has volunteered to submit information on new drugs. As you can see in this edition, they are both informative and interesting. Thanks to Dan for the time and effort he spent in compiling this information.

As promised in the last issue of **ToxTalk**, Don Kippenberger is busy translating articles from *Toxichem and Krimtech*, a European newsletter. The first translation appears in this issue.

TOXTALK SPECIAL EDITION - CASE REPORTS: The next issue of **ToxTalk** will be a special issue dedicated to case reports. Ines Collison has graciously volunteered to receive and organize all "Case Report" submissions for publication in June's **ToxTalk**. Look for details in this issue of **ToxTalk** and submit your contributions as soon as possible. Remember, case reports only need to be one-half page in length. ☺

2001 Committees and Chairs

Bylaws -	Yale Caplan
Budget, Finance & Audit -	Jim Valentour
Membership -	Amanda Jenkins
Nominating -	J. Robert Zettl
ToxTalk -	Joe Monforte
Publication (JAT) -	Tim Rohrig
Education Research Award -	Barbara Manno
Forensic Toxicology Lab Guidelines (AAFS/SOFT) -	Graham Jones
Drugs and Driving -	Laurel Farrell
Policy and Procedures -	Bill Anderson
Web Site -	Bruce Goldberger
Visioning Workgroup -	Joe Saady
Continuing Education -	Jennifer Limoges
Drug Facilitated Sexual Assault -	Marc LeBeau
Ethics -	Jeanne Beno
Meeting Resource Committee -	Laurel Farrell
2001 - New Orleans, LA	Pat Pizzo
2002 - Detroit, MI	Dan Isenschmid
	Brad Hepler
2003 - Portland, OR	Kent Johnson
2004 - Washington DC	Mark LeBeau
	Marilyn Huestis
	Rebecca Phipps
2005 - Nashville	Madeline Montgomery
2006 - Open	Louis Kuykendall
2007 - Chapel Hill	to be announced
	Ruth Winecker
	Jeri Roper-Miller

ARE YOU "OVER-DUE"?

If you have not yet paid your 2001 SOFT membership dues, please do so immediately to guarantee the continuation of your membership and related perks. SOFT members qualify for substantial discounts when registering for SOFT meetings. And you don't want to miss a single issue of **ToxTalk**!!!! Don't forget to include the \$7 late fee.

To confirm the status of your membership and/or dues payment or request a second form, if necessary, call the SOFT Administrative Office at 480-839-9106.

Publisher's note: As much as we like to chit-chat with SOFT members, do not contact ToxTalk or the Monfortes for membership or dues-related information. We don't have it. The database is maintained at the SOFT Administrative Office. ☺

MARCH 26: JAT/SOFT MANUSCRIPT DEADLINE

If you have not already done so, submit your completed manuscript to Dr. Timothy Rohrig, who may be contacted by phone: 316-383-4500, fax: 316-383-4535 or e-mail: trohrig@sedgwick.gov ☺

TOXTALK BEGINS ITS SILVER ANNIVERSARY

With this issue, **ToxTalk** marks its 25th year as the official newsletter of the Society of Forensic Toxicologists. Past editors are invited to submit comments regarding this publication. ☺

SOFT ANNUAL MEETING - SEPTEMBER 30 to OCTOBER 5, 2001

Radisson Hotel NEW ORLEANS, LA

MEETING AT A GLANCE

SUNDAY – SEPTEMBER 30, 2001

WORKSHOP #1 – *ALTERNATIVE TESTING (Part A)*
8 a.m. – noon Vince Papa, Ph.D.,
WORKSHOP #3 - *ALTERNATIVE TESTING (Part B)*
1 p.m. – 5 p.m. Leon Glass, Ph.D.
WORKSHOP #2 - *HERBAL MEDICINE*
8 a.m. – noon Barbara Manno, Ph.D.
WORKSHOP #4 - *URINE TESTING AND HUMAN*
PERFORMANCE 1 p.m. – 5 p.m.
Joseph Manno, Ph.D.

MONDAY - OCTOBER 1

WORKSHOP #5 - *ETHANOL*
8 a.m. – 5 p.m. James Garriott, Ph.D.
WORKSHOP #6 - *CLINICAL TOXICOLOGY*
8 a.m. – noon Larry Broussard, Ph.D.
WORKSHOP #7 - *THE IMPACT OF DAUBERT ON*
TESTIFYING AS A FORENSIC TOXICOLOGIST
WORKSHOP #8 - *ADULTERANT TESTING*
1:30 p.m. – 5 p.m. Mahmoud ElSohly, Ph.D.

TUESDAY – OCTOBER 2

SOFT Run/Walk 7 a.m.
Registration 7:30 a.m. – 5 p.m.
ABFT Examination 8 a.m. – noon
WORKSHOP #10 *VOODOO – DOES THIS PRACTICE*
USE TOXINS? 9 a.m. – 4 p.m.
ABFT Board Meeting noon – 6 p.m.
Exhibit set up 2 p.m.
NLCP Inspectors Workshop 7 p.m. – 10 p.m.

WEDNESDAY – OCTOBER 3

Registration 7:30 a.m. – 5 p.m.
Poster set up 7 a.m. – 9 a.m.
Consultants Breakfast 7 a.m. – 8 a.m.
WELCOME and Opening of Scientific Program 8 a.m.
SOFT Business Meeting 8 a.m. – noon
Exhibits and Posters 9 a.m. – 3:30 p.m.
Luncheon noon – 1 p.m.
Exhibits open noon – 5 p.m.
Scientific Session 1 p.m. – 3:45 p.m.
Welcome Reception 7 p.m. – 10 p.m.

THURSDAY – OCTOBER 4

Registration 7:30 a.m. – noon
ABFT Breakfast 7 a.m. – 8:30 a.m.
Vendors' Meeting 8 a.m. – 9 a.m.
Scientific Session 8 a.m. – noon
Exhibits and Posters open 9 a.m. – 3 p.m.
Luncheon noon – 1 p.m.
Scientific Session 1 p.m. – 5 p.m.
Farewell Dinner 6 p.m. – 9 p.m.
Elmer Gordon Forum 9 p.m. to 11 p.m.

FRIDAY – OCTOBER 5

Scientific Meeting 8 a.m. – noon
Poster Session 9 a.m. – noon
Exhibits open 9 a.m. – noon

PLEASE NOTE: This is a preliminary outline and subject to change.

Important deadlines:

JUNE 1st ABSTRACTS DUE
AUG. 1st MAIL REGISTRATION
No late fee & free t-shirt

For further information contact:

David Green 225-926-9173 x206 dgreen@lrl.dynacare.com
Pat Pizzo 504-361-8989 x291 ppizzo@labz.com

Additional information and forms, including registration and abstracts, are included as inserts in this issue of **ToxTalk** and may also be found on the SOFT website. ☒

Guidelines for Hosting an Annual SOFT Meeting Now Available: Potential SOFT meeting hosts should contact Laurel Farrell (farrell@oneimage.com) for details. ☒

DRUGS IN THE NEWS

Sydney Olympic Games Athletic Drug Testing – The Pseudoephedrine Controversy

Submitted by Vincent M.Papa, Ph.D. Brooks AFB, TX. 78238

At the recent Sydney Summer Olympic Games, athletic drug testing was often in the news. All the major television networks and national newspapers including USA Today reported on the Romanian gymnast having her gold medal taken away for testing positive for pseudoephedrine that her physician had prescribed. There was great controversy whether pseudoephedrine should be on the banned list and the need for depoliticization of the Olympic Testing process. Many observers believe that the World Athletic Testing Association (WATA) control will be the solution.

Pseudoephedrine occurs naturally in various *Ephedra* species as the d-isomer, in combination with l-ephedrine. Pseudoephedrine is administered orally as the hydrochloride for use as a nasal decongestant and bronchodilator in single doses of 15-60 mg. According to the Physician's Desk Reference (PDR), up to 240 mg can be taken orally. As an over the counter drug (OTC), it is in cold and allergy formulations in conjunction with antihistamines and analgesics. Important pharmacokinetic parameters have been illustrated by a number of investigators. Kuntzman administered 180 mg to 3 subjects with peak plasma levels occurring at 2-3 hours and averaging 0.77 mg/L. Additionally, plasma half lives varied from 5.2 – 8.0 hours in normal subjects and ranged from 3-16 hours when urine was made acidic or alkaline (1). As to metabolism and excretion, pseudoephedrine is metabolized to a minor extent by N-demethylation to norpseudoephedrine. Up to 88% of a dose is excreted unchanged in a 36-hour urine, with less than 1 % present as norpseudoephedrine (2). Baaske and Lo showed that a single 120 mg oral dose produced urine concentrations of 4-50 mg/L and 0.07 –0.52 mg/L of pseudoephedrine and norpseudoephedrine, respectively (3). Toxicity to pseudoephedrine may include headache, dizziness, palpitations, tachycardia, restlessness, pallor, weakness, cardiovascular hallucinations, etc. The literature reports that individuals can consume up to 3000-4500 mg daily as a psychic stimulant with the exhibition of tachycardia, lethargy, irritability, bizarre behavior, etc. (4).

Methods that have been used for the detection of pseudoephedrine include, but are not limited to, gas chromatography with either flame ionization (FID), nitrogen phosphorus (NPD) or electron capture (ECD) detection and high-pressure liquid chromatography (HPLC). In Forensic Urine Drug Testing (FUDT) laboratories, pseudoephedrine in elevated concentrations may interfere with the GCMS analysis for amphetamine/methamphetamine.

References

1. R.G.Kuntzman, I.Tsai, L.Brand and L.C.Mark: The influence of urinary pH on plasma half-life of pseudoephedrine in man and dog and a sensitive assay for its determination in human plasma. Clin.Pharm.Ther. 12: 62-67,1971.
2. C.Bye, H.M.Hill, DTD.Hughes and SW Peck: A comparison of plasma levels of l-pseudoephedrine following different formulations, and their relation to cardiovascular and subjective effects in man. Eur. J.Clin. Pharm. 8: 47-53, 1975.
3. D.M.Baaske, C.M.Lai, L.Klein et al.: Comparison of GLC and high-pressure liquid chromatography methods for the analysis of urinary pseudoephedrine. J.Pharm.Sci. 68: 1472, 1979.
4. M.A.Diaz, T.N.Wise, G.O.Semchyshyn. Self-medication with pseudoephedrine in a chronically ill depressed patient. Am.J.Psych. 136: 1217-1218, 1979.

Note: The views expressed above are solely those of the author and are not intended to be those of the Department of Defense or the United States Air Force ☺



CALL FOR CASE NOTES

We need your contribution! This need not take much time.

Your case note should be about 1/2 page in length, no more than a full page.

Material and/or a disk (arial font, size 10, Microsoft Word 6.0 preferred) may be submitted to:

Joseph R. Monforte, Ph.D., DABFT, **ToxTalk** Editor
42408 N. Sombrero Rd., Cave Creek, AZ 85331-2821

Or fax: 480-595-MONF (6663). PLEASE remember that Arizona is hours behind the East Coast.

NOTE: Dr. Monforte has returned to his original e-mail address: DrMonforte@aol.com

The rarely-checked alternate is still monforte@juno.com
Other items of interest to SOFT members are also welcome.

CASE NOTES

Clobenzorex/ Amphetamine / Methamphetamine Death in L.A.

Submitted by Daniel Anderson, Los Angeles County Department of the Coroner

Professional jockey found unresponsive at home with numerous pills, including Clobenzorex.

Toxicology results (partial)-ug/ml or ug/g			
	Clobenzorex	Amphetamine	Methamphetamine
Heart Blood	1.9	3.1	0.84
Femoral Blood	QNS	1.3	0.50
Bile	14	15	4.7
Liver	174	15	2.6
Gastric	4.9 mg	0.22 mg	0.12 mg
Urine	1.3	2.0	4.8

References

- Young R., Darmini N., Elder E., Dumas D., Glennon RA. Clobenzorex: Evidence for Amphetamine-Like Behavioral Actions. *Pharmacology Biochemistry and Behavior*, 1999;56 (2):311-316.
- Valtier S, Cody JT. Metabolic production of amphetamine following administration of clobenzorex. *J Forensic Sci* 1999;44(1):17-22.
- San Diego County Sheriff's Crime Laboratory. Clobenzorex. *Microgram*, 1999;XXXII (6); 183-184.
- Valtier S, Cody JT. A Gas Chromatography-Mass Spectrometry Method for the Quantitation of Clobenzorex. *J Anal Tox*, 1999;23: 603-608.
- Baden K., Valtier S., Cody JT. Metabolic Production of Amphetamine Following Multidose Administration of Clobenzorex. *J Anal Tox*, 1999;23:511-516 ☒

ANNOUNCEMENT

“CASE NOTES” FEATURED IN NEXT ISSUE

The June 2001 Issue of *ToxTalk* will be dedicated to Case Reports. Please adhere to the usual *ToxTalk* deadline for this issue, May 1, and submit your contributions to:

Ines B. Collison, Ph.D., Forensic Scientist
Orange County Sheriff-Coroner Department
320 N. Flower, Santa Ana, CA 92703
e-mail: rd329@fss.co.orange.ca.us Tel: 714-834-6402 Fax: 714-834-4519

Remember, a typical case note is only 1/2 to a full page. ☒

Cocaine and Marijuana Monographs Now Available!

Web Master Bruce Goldberger has announced the cocaine and marijuana monographs have recently been posted. To gain access to SOFT's on-line membership directory and drugs and driving pages, you must type the username and password. USERNAME: drugs PASSWORD: #cocaine!

Visit the SOFT web-site at www.soft-tox.org and get the latest information on items of interest to SOFT members. ☒

Visit the SOFT Web-site at www.soft-tox.org

Response to CO Deaths and Houseboats which appeared in the December 2000 issue of ToxTalk *Submitted by Lee Hearn, Ph.D., Lab Director, Miami-Dade County M. E. Dept.*

I consulted on a case in Florida that occurred 8/24/95 near Ocala. It resulted in a lawsuit, Russell v. Kohler, et al. The facts, briefly, are as follows:

Mr Gary Russell went into a below-deck space, using snorkel gear, to check the outdrive of his houseboat. His wife was operating the generator which exhausted into the same space. After approximately 5 minutes, he was seen floating. He was removed from the water and taken to the hospital where he died the next day. CO intoxication was documented.

I have my file from the case, which was settled without trial. ☹

Next ToxTalk deadline: MAY 1, 2001

EXTRAPOLATIONS

Workplace Drug Testing: How Is It Changing? *MLO February 2001*

Submitted by Irving Sunshine, Ph.D.

The third draft of the Health and Human Services Mandatory Guidelines will be officially published in the Federal Register within the next six months. Several important changes from the current guidelines will occur. The changes are in the areas of specimens used; the types of laboratories that can process them; and the type of information that can be determined from the test result.

The testing of specimens other than urine will be allowed. Proposed additional specimens are oral fluids, sweat, and hair. All of these specimens may be collected under observed conditions, thereby eliminating the privacy issues involved with observed urine collections.

A major revision in the HHS guidelines will allow laboratories to test at the point of collection. The methodology may range from hand-held kits to automated systems. This will make negative results available almost immediately, thus avoiding transportation of 95% of the specimens collected to the laboratory. Laboratories may elect to do only point of collection testing or screening and confirmation testing.

The optional specimens may also provide different interpretative values. For example, a hair specimen may provide information concerning drug usage over the past several months, whereas oral fluids may be more meaningful following a work accident because they provide a closer association to drugs in the individual at the time of the accident. Urine still has value as a random specimen.

FDA Clarifies Informed Consent. *CLN, July, 2000*

Submitted by Irving Sunshine, Ph.D.

For years labs have been conducting clinical trials on leftover blood samples under an institutional review board (IRB) waiver of informed consent. Now, however, the Department of Health and Human Services (HHS) is beginning to scrutinize research practices involving human subjects and has asked FDA to issue specific guidance on informed consent.

A preview of FDA's policy is for device studies to have IRB review and approval, and informed consent, even if no risk is involved. Since records would need to be reviewed to verify the studies, informed consent would had to have been obtained and the patient been told that the FDA might be looking at their records. FDA officials have indicated that high risk submissions would be reviewed for implied consent for certain, but the likelihood of auditing low risk submissions is low, depending upon the nature of the submission, the indications for product use, and whether or not it is a routine submission or involves new types of data.

Some researchers and manufacturers note that the FDA should not underestimate the impact its informed consent policy will have on manufacturers' abilities to investigate new technologies. Several institutions have indicated that they do not have adequate staffing to take on the additional burden of obtaining informed consent for all of the people whose excess samples will be used in a study, and therefore will no longer be able to participate in clinical studies related to new IVDs. ☹

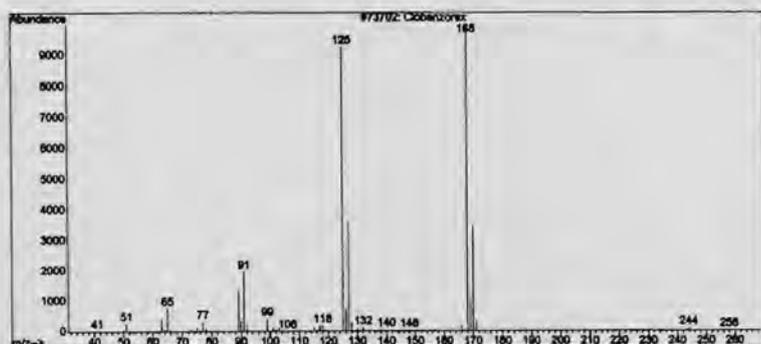
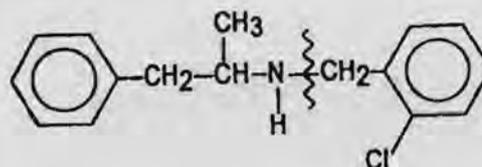
Clobenzorex (Asenlix®), Dinintel®, Finedal®)

General

Clobenzorex is a relatively new anorectic drug that has been cited in the literature the last couple of years. It is not available in the United States, but is available in other countries such as Mexico, Spain, Argentina, and France. Clobenzorex is manufactured by Hoechst Marion Roussel as a 30 mg capsule, dark/light green in color and marked with HMR. Clobenzorex metabolizes to d-amphetamine and has amphetamine-like central stimulant behavioral properties.

Chemical

- Clobenzorex Hydrochloride
 - (+)-N-(2-Chlorobenzyl)-alpha-methylphenethylamine hydrochloride
 - C₁₆H₁₈ClN·HCl
 - Formula weight 296.2
 - Molecular weight 259.5
 - CAS Registry No. 13364-32-4 (Clobenzorex), 5843-53-8 (Clobenzorex HCl)
- Clobenzorex is a basic drug and can be extracted with an n-butylchloride liquid/liquid extraction and an acid back extraction. According to the literature, it also can be extracted and derivitized very similar to amphetamine/methamphetamine-type compounds.
- Detection of clobenzorex is possible by either GC/NPD or GC/MS.



Ions: 168, 125, 170, 127, 91, 244, 258 m/z

Relative retention time of Clobenzorex (0.8558/Carbinoxamine) to other commonly encountered basic drugs are as follows:

Phencyclidine, Doxylamine, Tramadol, **CLOBENZOREX**, Chlorpheniramine, Cyclizine, Metoprolol

Pharmacology

- Symptoms include dry mouth, significant excitation, increased alertness and difficulty sleeping.
- Approximately 20 times less potent than (+)amphetamine
- 20% of a dose can be accounted for (after 24 hrs) as d-amphetamine or amphetamine metabolites.
- Principal metabolites excreted in urine of rats: 40% glucuronide, 5% amphetamine, 3% p-hydroxyamphetamine.
- Clinical studies

	Urine C _{max} (ug/ml)	
	Clobenzorex	Amphetamine
Single 30 mg dose	0.029	2.47 - Detectable for up to 116 hours post dose
30 mg dose for 7 days	0.047	4.7

Editor's note: See Case Notes "Clobenzorex / Amphetamine / Methamphetamine Death in L.A." ☒

NEW DRUGS is making its debut in this issue of ToxTalk. Editor Joseph Monforte would like to know what you think of this feature. Please direct your comments to: DrMonforte@aol.com

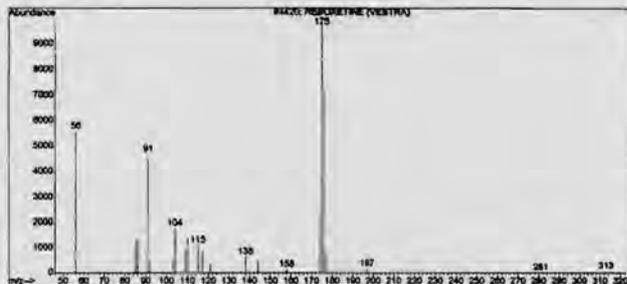
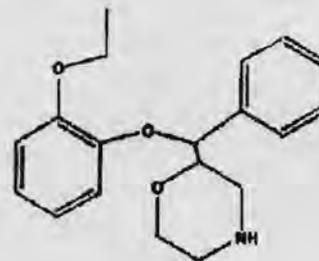
Reboxetine (Vestra®)

General

Reboxetine is a very new anti-depressant manufactured by Pharmacia & Upjohn and is currently distributed in Europe under the trade name Edronax®. The drug is considered a selective norepinephrine reuptake inhibitor (SNRI) that works on the norepinephrine chemical pathway in the brain. Reboxetine received FDA approval in July 1999 and is being dispensed as reboxetine mesylate tablets.

Chemical

- Reboxetine methanesulfonate
 - (2RS,3RS)-2-(alpha-(2-Ethoxyphenoxy)benzyl)morpholine methanesulfonate
 - C₁₉H₂₃NO₃·CH₄SO₃
 - Formula weight 409.51
 - Molecular weight 313.39
- White powder soluble in methanol and dimethylformamide. Partially soluble in ethanol and water.
- Reboxetine is a basic drug and can be extracted with an n-butylchloride liquid/liquid extraction and an acid back extraction.
- Detection of reboxetine is possible by either GC/NPD or GC/MS.



Ions: 175, 176, 91, 56, 174, & 313 m/z

Relative retention time of Reboxetine (1.304/Carbinoxamine) to other commonly encountered basic drugs are as follows:

Promethazine, Bupivacaine, Benztropine, **REBOXETINE**, Norsertaline, Sertraline, Codeine

Pharmacology

- Reboxetine is metabolized in the liver to O-Desmethylreboxetine, its primary metabolite, and three minor metabolites.
- Absorbs rapidly, T_{max} ~ 2 hours
- Half-life: 13 hours
- Bioavailability: 92 %
- Urinary Excretion: 9% of dose
- Clinical Trials

Dose	C _{max}	
1.5 mg	38.3 ± 13.5	ng/ml
3.0 mg	76.6 ± 26.3	ng/ml
4.5 mg	99.8 ± 24.1	ng/ml
5.0 mg	164	ng/ml

Congratulations to Daniel Anderson of the Los Angeles Coroner's Office who has been appointed to the 2001 **ToxTalk** Editorial Board. Dan has initiated the "New Drugs" regular feature. Good work, Dan! Submit information on new drugs relative to forensic toxicology to:

Daniel Anderson, M.S.
L.A. County Coroner's Dept.,
1104 N. Mission Road, Los Angeles, CA 90033
E-mail: danderso@co.la.ca.us Ph: 323-343-0530

Primary Care Physicians Need Training in Substance Abuse

Submitted by Ashraf Mozayani, PharmD., Ph.D. DABFT, Harris County Medical Examiner Office, 1885 Old Spanish Trail, Houston, Texas 77054 713-796-6830 713-796-6838 (fax)

Most primary care physicians are not confident in their ability to diagnose substance abuse, according to a survey by the National Center on Addiction and Substance Abuse at Columbia University (CASA). Fewer than one-third believed that they were prepared to diagnose misuse of prescription drugs; only 20 percent were prepared to diagnose alcoholism; and even fewer, 17 percent, said they were prepared to identify abuse of illegal drugs. In contrast, more than 80 percent felt prepared to diagnose hypertension and diabetes. Physicians were also more confident in their ability to treat these diseases. Among the barriers to diagnosing substance abuse are the inability to recognize the cluster of symptoms that signal it; skepticism about the effectiveness of treatment; and discomfort discussing the subject with patients. To begin addressing this issue, the authors recommend that "medical schools and residency and continuing medical education (CME) programs step up training in substance abuse" and that questions about substance abuse be included in every exam for licensing physicians.

Percentage of primary care physicians reporting they are very prepared to diagnose/identify patients with chronic conditions:

Hypertension 83%
Diabetes 82%
Depression 44%
Misuse of prescription drugs 30%
Alcoholism 20%
Illegal drugs 17%

Source: National Center on Addiction and Substance Abuse at Columbia University (CASA), "Missed Opportunity: National Survey of Primary Care Physicians and Patients on Substance Abuse," April, 2000 via CSAT by Fax. ☒

Toxichem + Krimtech 66:2, 106 (1999)

2nd European Meeting on Hair Analysis, 14 to 16 June 1999, Martigny, Switzerland by Fritz Pragst, Berlin

Submitted by Donald Kippenberger, Ph.D.

This meeting, organized by the Society of Hair Testing and hosted by Christian Staub and his collaborators (University of Forensic Medicine, Geneva), had 26 oral presentations, 20 posters and 84 participants. The meeting was held in the modern "Centre du Parc" conference center with attached hotel, enclosed vineyards and surrounded by mountain peaks.

The first day was dedicated to questions on methodology. In three Plenary Lectures new possibilities involving immunological procedures, capillary electrophoresis, HPLC and mass spectrometry were presented.

Other topics covered during the conference were: applications of Headspace SPME in combination with alkaline hair extraction to testing for relatively nonvolatile compounds such as methadone, Tramadol, diphenhydramine, local anaesthetics, phenothiazine and tricyclic antidepressants; a system for hair extraction with supercritical liquids; the detection (0.3 pg/mg) of delta-9-THC-COOH in hair using MSD-NCI after cleanup of extracts by HPLC and interpretation of results; problems in the interpretation of results in terms of dose/concentration relationships, hair color, and cultural differences; suggested cut off-values as well as concentration values for light, middle and heavy abuse of 6-acetylmorphine, cocaine, and THC; the application of hair testing to driving under the influence cases; and the application of hair testing to doping control. Poster sessions dealt with the stability of drugs in hair, methods for the regulation of arsenic and selenium in hair and the detection of LSD in hair. .

On June 16th 1999, at the conclusion of the conference, the Society of Hair Testing issued a summary statement:

- Hair analysis, in addition to urine testing, can essentially contribute to *doping analysis* in special cases.
- Hair specimens are necessarily suitable for general routine control.
- In cases of affirmative urine results the adverse hair results cannot exclude the administration of the detected drug and cannot overrule the affirmative urine result.
- In cases of adverse urine results, the affirmative hair results demonstrate drug exposure (internal or external) during the period prior to sample collection.
- Before using hair samples in doping control sampling, analytical methods have to be harmonized with respect to the sophisticated requirements already valid for urines.

The Society of Hair Testing feels responsible to support efforts that lead to this harmonization. ☒

Lo, D., T. Chao, et al. "Acidic and neutral drugs screen in blood with quantitation using microbore high-performance liquid chromatography-diode array detection and capillary gas chromatography-flame ionization detection" *Forensic Science International* 90 (3): 205-14. (1997).

Chao, T. "Adverse drug reactions--tales of a forensic pathologist" *Annals of the Academy of Medicine, Singapore* 22 (1): 86-9. (1993).

Cox, D., D. Sadler, et al. "Alcohol estimation at necropsy: epidemiology, economics, and the elderly [see comments]" *Journal of Clinical Pathology* 50 (3): 197-201. (1997).

Pounder, D., R. Stevenson, et al. "Alcoholic ketoacidosis at autopsy" *Journal of Forensic Sciences* 43 (4): 812-6. (1998).

Christophersen, A. "Amphetamine designer drugs - an overview and epidemiology" *Toxicology Letters* 112 : 127-131. (2000).

Garcia-Borregon, P., M. Lores, et al. "Analysis of barbiturates by micro-high-performance liquid chromatography with post-column photochemical derivatization" *Journal of Chromatography* 870 (1-2): 39-44. (2000).

Girod, C. and C. Staub "Analysis of drugs of abuse in hair by automated solid-phase extraction, GC/EI/MS and GC ion trap/CI/MS" *Forensic Science International* 107 (1-3): 261-71. (2000).

Furton, K., J. Almirall, et al. "Application of solid-phase microextraction to the recovery of explosives and ignitable liquid residues from forensic specimens" *Journal of Chromatography* 885 (1-2): 419-432. (2000).

Radcliffe, C., K. Maguire, et al. "Applications of supercritical fluid extraction and chromatography in forensic science [Review]" *Journal of Biochemical & Biophysical Methods* 43 (1-3): 261-272. (2000).

Hanzlick, R. "The autopsy lexicon - Suggested headings for the autopsy report" *Archives of Pathology & Laboratory Medicine* 124 (4): 594-603. (2000).

Fitzgerald, R., J. Rivera, et al. "Broad spectrum drug identification directly from urine, using liquid chromatography-tandem mass spectrometry" *Clinical Chemistry* 45 (8 Part 1): 1224-1234. (2000).

Thormann, W., A. Wey, et al. "Capillary electrophoresis in clinical and forensic analysis: Recent advances and breakthrough to routine applications [Review]" *Electrophoresis* 20 (15-16): 3203-3236. (1999).

Lazar, I., G. Naisbitt, et al. "Capillary electrophoresis time-of-flight mass spectrometry of an opium powder"

Chromatographia 50 (3-4): 188-194. (1999).

Manetto, G., F. Crivellente, et al. "Capillary electrophoresis: A new analytical tool for forensic toxicologists" *Therapeutic Drug Monitoring* 22 (1): 84-88. (2000).

Tagliaro, F., G. Manetto, et al. "Capillary zone electrophoresis of potassium in human vitreous humour: validation of a new method" *Journal of Chromatography B* 733 (1-2): 273-279. (1999).

Gall, J. "Centres of excellence are needed for clinical forensic medicine" *British Medical Journal* 320 (7235): 4. (2000).

Wong, S. "Challenges of toxicology for the millennium" *Therapeutic Drug Monitoring* 22 (1): 52-57. (2000).

Staub, C. "Chromatographic procedures for determination of cannabinoids in biological samples, with special attention to blood and alternative matrices like hair, saliva, sweat and meconium [Review]" *Journal of Chromatography B* 733 (1-2): 119-126. (1999).

Klein, J., T. Karaskov, et al. "Clinical applications of hair testing for drugs of abuse--the Canadian experience" *Forensic Science International* 107 (1-3): 281-8. (2000).

Ramseier, A., C. Siethoff, et al. "Confirmation testing of amphetamines and designer drugs in human urine by capillary electrophoresis-ion trap mass spectrometry" *Electrophoresis* 21 (2): 380-387. (2000).

Pounder, D. "Death investigation in colonial South Australia: the early years 1836-1839" *Pathology* 17 (1): 129-34. (1985).

Issaq, H. "A decade of capillary electrophoresis" *Electrophoresis* 21 (10): 1921-1939. (2000).

Stefanidou, M., S. Athanaselis, et al. "Delta(9)-tetrahydrocannabinol content in cannabis plants of Greek origin" *Chemical & Pharmaceutical Bulletin* 48 (5): 743-745. (2000).

Carson, D., Y. Orihara, et al. "Detection of white restorative dental materials using an alternative light source" *Forensic Science International* 88 (2): 163-8. (1997).

Kintz, P. and N. Samyn "Determination of "Ecstasy" components in alternative biological specimens [Review]" *Journal of Chromatography B* 733 (1-2): 137-143. (1999).

Bogusz, M., R. Maier, et al. "Determination of flunitrazepam and its metabolites in blood by high-performance liquid chromatography-atmospheric pressure chemical ionization mass spectrometry" *J*

Send YOUR contribution to ToxTalk before the next deadline (May 1st)

ELMER GORDON OPEN FORUM

AN OPPORTUNITY FOR INFORMAL DIALOGUE

Send items for this section to Editor Joseph Monforte e-mail DrMonforte@aol.com or fax to 480-595-6663.

Pat Monforte wishes to thank everyone for their cards and good wishes for a speedy, full recovery. By the time you receive this issue of ToxTalk, she should know if (or if not) the cervical epidural injections were successful. She hopes to reunite with "SO-SOFT" in New Orleans!

Gary Kunsman joins the "I-was-an-innocent-victim-in-a-broadside-collision" club. He's honorary president since he was hit by a "semi" and Pat was smashed by a commercial van. I understand Gary was hospitalized and is now home recuperating and working part-time. Words of encouragement may be sent to Gary at gkunsman@co.bexar.tx.us Get well soon, Gary! ☺

CAREER OPPORTUNITIES

Positions available are listed for the consideration of SOFT members. There is no fee for this service. The information will be repeated in the next issue only if the person who submitted it confirms the information. If you have a job position available, FAX (480-595-6663) or E-MAIL (DrMonforte@aol.com) to **ToxTalk** or mail to: Dr. Joseph Monforte, **ToxTalk** Editor, 42408 N. Sombrero Rd., Cave Creek, AZ 85331-2821.

The following employment opportunities are listed on the SOFT website (12/16/01-3/01/01). For more information, go to www.soft-tox.org

Position – City – State - Post Date

Chief Toxicologist ,Washington DC 2/27/01
Senior Medical Tech-Toxicology, Augusta GA 2/26/01
Technologist San Diego CA 2/16/01
Forensic Scientist Supervisor and Senior Forensic Scientist, West Palm Beach FL 2/10/01
Forensic Toxicologist, San Francisco CA 2/6/01
Quality Assurance Manager, Salem OR 2/3/01
Forensic Chemist I, Syracuse NY 2/3/01
Assistant Toxicologist II, Houston TX 1/30/01

Lecturer/Senior Lect Forensic Sci, London UK 1/28/01
Forensic Tox Laboratory Mgr, San Diego CA 1/18/01
GC/MS Operators and Repair and Maintenance, Las Vegas NV 1/12/01
Chemist B or Senior Chemist, Burlington VT 1/5/01
Forensic Scientist 3 in Toxicology, Seattle WA 1/5/01
Foundation Assistant / Associate, Willow Grove PA 12/14/00
Forensic Certifying Scientist, St. Paul MN 12/12/00 ☺

PROFESSIONAL CALENDAR

SOFT MEETINGS:

2001 - New Orleans, LA - Pat Pizzo September 30 – October 5
2002 - Detroit, MI - Dan Isenschmid /Brad Hepler October 12-17, 2002
2003 - Portland, OR - Kent Johnson
2004 – Washington, D.C. – Marc LeBeau

International Association of Forensic Sciences: September 2-7, 2002, Montpellier, France. Information by e-mail: algcsi@mnet.fr

All members and others are encouraged to contribute to **ToxTalk**. Please mail your contribution to:

Joseph R. Monforte, Ph.D., DABFT, ToxTalk Editor
42408 N. Sombrero Rd, Cave Creek, AZ 85331-2821

E-mail: DrMonforte@aol.com or Fax: 480-595-6663 (after 11 a.m. E.S.T. please)

SOFT 2001
SEPTEMBER 30 – OCTOBER 5, 2001
RADISSON HOTEL - NEW ORLEANS, LOUISIANA

WORKSHOP PROGRAM ABSTRACTS

WORKSHOP #1 – ALTERNATIVE TESTING A

Sunday, September 30, 2001 8:00 a.m. – 12:00 p.m.
Vince Papa, Ph.D., Moderator

This is the first half of a full day seminar on alternative testing. This session will be devoted to techniques that are non traditional in most forensic labs. The program will cover the uses of ICP, LCMS, LCQ, and CZE in forensic drug testing.

WORKSHOP #3 - ALTERNATIVE TESTING B

Sunday, September 30, 2001 1:00 p.m. – 5:00 p.m.
Leon Glass, Ph.D., Moderator

Part two of alternative testing will be devoted to MS techniques and include MS/MS, GC/MS, and LC/MS. This workshop will benefit those who are current perators as well as those new to the field.

WORKSHOP #2 - HERBAL MEDICINE

Sunday, September 30, 2001 8:00 a.m. – 12:00 p.m.
Barbara Manno, Ph.D., Moderator

This should not only be informative, but also fun. The coordinators have put together a well balanced presentation. The workshop will cover the positive input of using herbal medicines, the toxicology of overdose and chronic use, drug interaction and the impact of herbal products on drug test results.

WORKSHOP #4 - URINE TESTING AND HUMAN PERFORMANCE

Sunday, September 30, 2001 1:00 p.m. – 5:00 p.m.
Joseph Manno, Ph.D., Moderator

The issue of ethanol and human performance has been a frequent topic of discussion at toxicology meetings. This workshop will explore the interpretation of urine drug screen results and human performance. The first portion of the program will address the urinary excretion of drugs, physiology, pharmacology and toxicology. The emphasis then moves to individual drugs and ethanol, cocaine and marijuana will be discussed at length. Can you really attribute any significance to a urine drug level? Hopefully this workshop will answer that question and many more.

WORKSHOP #5 - ETHANOL

Monday, October 1, 2001 8:00 a.m. – 5:00 p.m.
James Garriott, Ph.D., Moderator

After the resounding success of the prior workshops a return engagement was absolutely necessary. This workshop will cover ethanol from A to Z. The program is designed to cover topics from detection to interpretation of results. Issues such as matrix, correlation of results, post mortem samples and DUI specimens will be addressed.

WORKSHOP #6 - CLINICAL TOXICOLOGY

Monday, October 1, 2001 8:00 a.m. – 12:00 p.m.
Larry Broussard, Ph.D., Moderator

Clinical toxicology, a topic often overlooked in the current rage of workplace testing and DUI analysis. Situations of overdose and accidental poisoning are often the major concern for hospitals and medical examiners offices. This workshop will address topics such as initial management of poisoning and overdose victims, antidotes, and common poisons.

WORKSHOP #7 - THE IMPACT OF DAUBERT ON TESTIFYING AS A FORENSIC TOXICOLOGIST

Whether you're a seasoned veteran or the "new kid on the block", this workshop will provide helpful information. The program will include review of Daubert, Frye and the essential rules of evidence and preparing for direct and cross examinations. A new twist will be audience participation for demonstration and drills.

WORKSHOP #8 - ADULTERANT TESTING

Monday, October 1, 2001 1:30 p.m. – 5:00 p.m.
Mahmoud ElSohly, Ph.D., Moderator

The classic case of good versus evil. The forensic toxicologist (wearing the white hat) is in a daily battle to overcome the evil drug culture villain, the adulterant manufacturers (wearing the black hat). As quickly as we isolate and identify an adulterant a new and more difficult to detect product is on the Internet. This workshop will visit the adulterants we can currently identify and explore what's new and potential as an adulterant.

SOFT ANNUAL MEETING

SEPTEMBER 30 to OCTOBER 5, 2001

Radisson Hotel

NEW ORLEANS, LA

PRELIMINARY MEETING SCHEDULE

SUNDAY – SEPTEMBER 30, 2001

7:30 a.m. – 8:30 p.m. Registration Open
8:00 a.m. – noon
WORKSHOP #1 - ALTERNATIVE TESTING (Part A)
Vince Papa, Ph.D.,
WORKSHOP #2 - HERBAL MEDICINE Barbara
Manno, Ph.D
1:00 p.m. – 5:00 p.m.
WORKSHOP #3 - ALTERNATIVE TESTING (Part B)
Leon Glass, Ph.D.
**WORKSHOP #4 - URINE TESTING AND HUMAN
PERFORMANCE** Joseph Manno, Ph.D.

MONDAY - OCTOBER 1

7:30 a.m. – 5:00 p.m. Registration
8:00 a.m. – 5:30 p.m.
WORKSHOP #5 - ETHANOL James Garriott, Ph.D.
8:00 a.m. – noon
WORKSHOP #6 - CLINICAL TOXICOLOGY Larry
Broussard, Ph.D.
**WORKSHOP #7 - THE IMPACT OF DAUBERT,
JOINER, KUMHO ON TESTIFYING AS A
FORENSIC TOXICOLOGIST**
noon – 5:00 p.m. SOFT Board Meeting
1:00 – 5:00 p.m. **WORKSHOP #8 -
ADULTERANT TESTING** Mahmoud ElSohly, Ph.D.

TUESDAY – OCTOBER 2

7:00 a.m. – 8:00 p.m. SOFT Run/Walk
7:30 a.m. – 5 p.m. Registration
8:00 a.m. – noon ABFT Examination
9:00 a.m. – 4:00 p.m. **WORKSHOP #10 VOODOO –
DOES THIS PRACTICE USE TOXINS?**
noon – 6:00 p.m. ABFT Board Meeting
2:00 p.m. Exhibit set up
7:00 p.m. – 10 p.m. NLCP Inspectors Workshop

WEDNESDAY – OCTOBER 3

7:30 a.m. – 5:00 p.m. Registration
7:00 a.m. – 8:00 a.m. Bob Bost Consultants Breakfast
7:00 a.m. – 9:00 a.m. Poster set up
8:00 a.m. – 8:15 a.m. WELCOME and Opening of
Scientific Program
8:00 a.m. – noon SOFT Business Meeting
9:00 a.m. – 3:30 p.m. Exhibits and Posters
noon – 1:00 p.m. Luncheon
noon – 5:00 p.m. Exhibits open
1:00 p.m. – 3:45 p.m. Scientific Session
7:00 p.m. – 10 p.m. Welcome Reception

THURSDAY – OCTOBER 4

7:30 a.m. – noon Registration
7:00 a.m. – 8:30 a.m. ABFT Breakfast
8:00 a.m. – 9:00 a.m. Vendors' Meeting
8:00 a.m. – noon Scientific Session
9:00 a.m. – 3:00 p.m. Exhibits and Posters Open
noon – 1:00 p.m. Luncheon
1:00 p.m. – 5:00 p.m. Scientific Session
6:00 p.m. – 9:00 p.m. Farewell Dinner
9:00 p.m. to 11 p.m. Elmer Gordon Forum

FRIDAY – OCTOBER 5

8:00 a.m. – noon Scientific Meeting
9:00 a.m. – noon Exhibits Open

Please note:

**This preliminary outline supercedes all
other resources and is subject to change.**

Important deadlines:

JUNE 1st ABSTRACTS DUE
AUG. 1st MAIL REGISTRATION
No late fee & free t-shirt

For further information contact:

David Green 225-926-9173 x206 dgreen@lrl.dynacare.com
Pat Pizzo 504-361-8989 x291 ppizzo@labz.com



S.C. AT.
DAY-LONG EXCURSION & SEMINAR
October 2, 2001
9:00 a.m. – 5:30 p.m.



VOODOO SWAMP AND PLANTATION TOUR
PRICE: \$105.00 per person

Sit back, relax and enjoy a delightful journey through Louisiana History and countryside. Our native tour guide will point out sites and plantations, as well as tell tales of the bygone ante-bellum period. Among the sights will be a boat tour into the depths of bayou country on an adventure into the pristine bayous and swamps of south Louisiana.

Emerge from the swamp and continue along the river to famous Oak Alley, where in the early 1700's, an unknown French Settler built a small house on the site of the present mansion. It was he who planted the twenty-eight live oak trees in two evenly spaced rows, reaching from his house to the Mississippi River. Enjoy a boxed lunch under the tented canopy while learning about the lore and legends of Voodoo in the old south. "Bloody Mary", a local Voodoo Priestess, and her assistants will entertain and educate your guests with this specialized program.

Another stop on our tour is Destrehan Plantation. Built in 1787, Destrehan is the oldest documented plantation house left intact in the lower Mississippi. In contrast to the cypress architecture of Destrehan is bright and colorful San Francisco Plantation, so named as a derivation of the French Slang "sans fruscins" – "without a penny in my pocket", in reference to its high cost to build. The sounds and sights of the swamps and Plantations will fill your senses and conversations as you return to New Orleans from a memorable tour of the culture of Southern Louisiana.

Reservations Must be Made No Later Than August 1, 2001.
Tour Tickets Will Be Provided at the Registration Area at the Radisson Hotel.

MAKE CHECKS PAYABLE TO:
Visit New Orleans
#2 Canal Street – Suite 2500
New Orleans, LA 70130-1587

If Paying By Credit Card Fax The Completed Form To:
504-569-1462

REGISTRATION FORM

VOODOO, SWAMP AND PLANTATION TOUR

@ \$105.00 # _____ AMT. \$ _____

TOTAL: _____

NAME: _____

ADDRESS: _____

TELEPHONE: _____

BUSINESS FAX: _____

CREDIT CARD: (circle one) VISA AMX MASTERCARD

CARD #: _____

EXP. DATE: _____

NAME ON CARD: _____

SIGNATURE: _____



SOCIETY OF FORENSIC TOXICOLOGISTS

ANNUAL MEETING 2001

September 30 – October 5

HOTEL REGISTRATION FORM



RADISSON

Fax to: (504) 523-9617

Or call: 1-800-333-3333

Or access: www.radisson.com

Or mail this completed form to:

Radisson Hotel New Orleans

1500 Canal Street, New Orleans, LA 70112

Telephone: 504-522-4500

PLEASE PRINT:

NAME: _____

COMPANY: _____

ADDRESS: _____

Business Phone: _____

Fax Number: _____

Arrival Date: _____ (4:00 p.m. check in)

Airline & Flight # _____ Time: _____

Departure Date: _____ (11:00 a.m. check out)

Airline & Flight # _____ Time: _____

Reservations will be held with a one night's deposit with the following credit cards or by enclosing a check of money order:

Visa

American Express

Diners Club

Check/Money Order Enclosed

MasterCard

Discover

Card Number: _____

Expiration Date: _____

Card Holder Signature: _____

I understand that I am liable for one night's room charge, which will be deducted from my deposit, or billed through my credit card, in the event that I do not arrive on the date indicated or cancel my reservation at least 48 hours prior to arrival.

Reservations must be received by September 7, 2001. Reservations received after this date will be subject to availability.

GUEST ROOM RATE

Rate Quoted of \$113.00 Single/Double per night.

of Rooms _____

of Adults _____

of Children _____

Special Requests:

(Rooms are for single/double occupancy and are subject to an 11% sales tax. Extra person charge is \$15.00 person with a maximum of 4 people per room. Children under 18 at no additional charge. Subject to availability, the resort will honor the group rate 3 days prior to and 3 days after the official meeting dates.

SOFT 2001

NEW ORLEANS, LOUISIANA SEPTEMBER 30 – OCTOBER 5, 2001

MEETING REGISTRATION FORM

NAME _____ DEGREE _____
LAST FIRST

TITLE/AGENCY _____

ADDRESS _____

TELEPHONE _____ FAX _____

GUEST(S) _____ E-MAIL _____

CURRENT SOFT MEMBER NON-MEMBER STUDENT: University _____

	<u>MEMBER</u>	<u>NON-MEMBER</u>	<u>TOTAL ENCLOSED</u>
Includes admission to all scientific sessions. Welcome Reception, Farewell Dinner. Luncheon Wednesday and Thursday. Breaks and Elmer Gordon Open Forum	\$170.00	\$220.00	_____
Workshop #1 Alternative Testing A- 8:00 a.m.-12:00 p.m.	\$50.00	\$75.00	_____
Workshop #2 Herbal Medicine	\$50.00	\$75.00	_____
Workshop #3 Alternative Testing B -1:00 p.m.-5:00 p.m.	\$50.00	\$75.00	_____
Workshop #4 Urine Testing and Human Performance 1:00p.m.-5:00p.m.	\$50.00	\$75.00	_____
Workshop #5 Ethanol - 8:00 a.m.-5:30 p.m.	\$75.00	\$100.00	_____
Workshop #6 Clinical Toxicology 8:00 a.m.-12:00 p.m.	\$50.00	\$75.00	_____
Workshop #7 Expert Witness Testimony 8:00 a.m.-12:00 p.m.	\$50.00	\$75.00	_____
Workshop #8 Adulterant Testing 1:30 p.m.-5:30 p.m.	\$50.00	\$75.00	_____
Workshop #10 Voodoo – 9:00 a.m.-4:00 p.m	\$125.00	\$135.00	_____
Full Time Student	\$25.00	\$40.00	_____
ABFT Breakfast (Thursday, Oct. 4)	\$25.00	\$25.00	_____
Extra Tickets:			
Welcome Reception # _____ @ \$35.00			_____
Farewell Dinner # _____ @ \$40.00			_____
Lunch Wednesday # _____ @ \$25.00			_____
Lunch Thursday # _____ @ \$25.00			_____
Elmer Gordon Forum # _____ @ \$12.00			_____
Dessert/Liquors			_____
Meeting T-shirt: <i>One free if registered by August 1 (\$10.00 each after 08/01)</i>			
#Large _____ #X-Large _____ #XX-Large _____ Total # of shirts _____			_____
Late Fee: For all registrations received after August 1, 2001		\$50.00	_____

TOTAL \$ _____

No mail registrations accepted after August 1, 2001. Payment by personal or business checks drawn on a USA bank, International Bank Checks or Money Order. All funds must be paid in US dollars. Make payable to SOFT.

Refund Policy: Refunds may be honored upon written request prior to 08/01/01. minus a \$50 processing fee.

<p>For payment by credit card: Type of Card (circle one): Visa Master Card AmX</p> <p>Card No. _____ Expiration Date _____</p> <p>Signature _____</p>

Mail to: SOFT 2001 New Orleans, c/o KLSI, Attn: Pat Pizzo, 1111 Newton Street, Gretna, LA 70053
 Fax: 504-361-8235

WHAT TO DO IN NEW ORLEANS

The Radisson furnishes a trolley service to many of the downtown areas. These sites can be visited for only admission fees. Those attractions within trolley service of the hotel are listed below:

Aquarium of the Americas

Hours 9:30 a.m. Cost - Adults - \$13.00, Seniors - \$10.00, Children under 12 - \$6.50

Audubon Zoo - Accessible at the Aquarium with a combined riverboat ride. You can visit the Aquarium and then take the John J. Audubon Riverboat to the Zoo or vice versa, the boat trip is 1 hour. Cost: Adults - Zoo and Aquarium = \$28.25 / Zoo, Aquarium and IMAX = \$34.50

Departure times:

<u>From Aquarium</u>	<u>From Zoo</u>
10:00a.m.	11:00a.m.
noon	1:00p.m.
2:00p.m.	3:00p.m.
4:00p.m.	5:00p.m.

IMAX - can be visited separately or as part of a zoo/aquarium/boat tour or aquarium and IMAX tour, shows hourly 10:00a.m.-6:00p.m.

Cost: IMAX only \$7.75/\$6.75/\$5.00
IMAX+Aquarium
\$17.25/\$14.00/\$10.50

Audubon Living Science Museum (an insectarium) - the first free standing museum of its kind in the U.S., hours of operation and admission cost will be furnished as soon as available.

For more information on the zoo, aquarium, IMAX, Science Museum contact www.auduboninstitute.org

D-Day Museum - dedicated to World War II. This museum opened June 6, 2000 and is the only one of its kind in the U.S. Hours 9:00a.m.-5:00p.m. daily. Web site www.ddaymuseum.org.

The Confederate Museum

- founded in 1891 as a repository for the memorabilia of Louisiana Confederate veterans, this museum houses 90,000 war related documents and artifacts. Open 10:00a.m.-4:00p.m. Cost: Adults - \$5.00, Seniors \$4.00, Children \$2.00. Web site www.confederatemuseum.com.

Contemporary Arts

Center - no permanent collection. Exhibits rotate 5 times per year. Open Tuesday-Saturday, 11:00a.m.-5:00p.m.

Admission is free on Thursday (as a guest of Texaco), \$3.00 for Adults and \$2.00 for Seniors

Children's Museum and Ogden Museum of Southern Art

- both museums are in walking distance of the Contemporary Art Center.

Mardi Gras World - take the trolley to the Aquarium of the Americas, ride the free ferry across the mighty Mississippi and you are on your way to Mardi Gras World. This is where the artist and sculptors actually create the magic of Mardi Gras. You will see the floats used in all the major parades as well as those under construction. Once you arrive on the Westbank

of the river (Algiers) a free van from Mardi Gras World will transport you to the facility. The ferry and van run on the hour and half hour. Admission is adults \$11.50, seniors (62+) \$8.50. If you call in advance with a group of 20 or more, the admission drops to \$8.50/\$7.00. Web site www.mardigrasworld.com.

Walking tour of the French Quarter.

The National Parks Service has an office in the Old French Market that conducts walking tours of the French Quarter.

Harrah's Casino - located at the river and Canal Street. This facility is also easily accessible by the Radisson's free trolley. Be very careful, this facility tends to keep ones money, only the fortunate few leave with more money than they had upon entering.

Trolley Car Ride - ride a historic trolley car to the Uptown or Garden District of New Orleans. The fare is \$1.25 one way. The trip is 13.13 miles and takes about 1½ hours from Canal Street to Carrollton and back to Canal. You can stop all along the track. You will pass Audubon Park, Tulane and Loyola Universities and travel under an arch of majestic oaks.

Riverboat Rides - New Orleans has several riverboats, the Natchez (location of our welcome reception), the Cotton Blossom, the Jean Lafitte and the John J. Audubon (trip to the zoo). All of these are easily accessible along the river walk. Most trips are 2-3 hours or less.

SOFT 2001
September 30 – October 5, 2001
New Orleans

Instructions for Abstract Preparation

General Instructions:

The program committee solicits abstracts on all forensic toxicology topics, but is especially interested in papers on the analysis of drugs and metabolites in alternative biofluids and tissues such as hair, sweat, saliva, skin, vitreous, breast milk, meconium, etc. and in papers relating drug concentrations to performance impairment, drug interactions, drug metabolism, pharmacology and pharmacokinetics. Platform presentations will be 15 min including questions. The dimensions of the poster board will be provided at a later date. Tack boards and thumb tacks will be provided. An original and three copies of the abstract must be submitted on the official abstract form. Please also submit the abstract on a computer disk. Electronic submissions must be in IBM word processing format (MS Word for Windows preferred) or ASCII format. Please label the disk with the first author's name and the word processing program utilized. **The deadline for submission of abstracts is June 1, 2001.** The presenting authors of all papers will be required to register for the meeting. Only abstracts written in English will be considered.

Content of Abstract

1. Author(s) names and addresses
2. Short specific title
3. Statement of paper's objectives
4. Statement of methods, if pertinent
5. Statement of results
6. Statement of conclusion
7. Key words (3 each)

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Format of Abstract

Abstracts must be typed and submitted in a neat legible format following the instructions and style provided in the sample below. Type the entire abstract within the boxed area, single spaced with 12 point font. Type the title in upper and lower case, followed by the author(s) names and addresses. Use an Asterisk(*) to identify the presenting author. Separate the author(s) names from the body of the abstract by a single blank line. Indent each paragraph three spaces. Identify three key words at the bottom of the abstract.

Notification of Acceptance

All submitting authors will be notified of receipt of the abstract. Notification of acceptance of the abstract and selection of the type of presentation will be mailed or sent by fax or e-mail no later than August 21, 2001.

Specific Instructions

Complete the attached form and follow the sample provided below. Proof-read all information provided. Send the original, three additional copies and an IBM disk with the abstract to:

Sample Abstract

Title: Type Upper and Lower Case. Use Significant Words Descriptive of Subject Content

Author(s) Names and Addresses: Type Upper and Lower Case; Spell Out First and Last Names, Use Middle Initial, e.g. John B. Smith

Indent each paragraph three spaces. Type the entire abstract within the boxed area, single spaced. Do not type in all capital letters. Capitalize and punctuate exactly as you wish the abstract to appear in the program.

Key Words: Type three key words or phrases in upper and lower case.

SOFT 2001
SEPTEMBER 30 – OCTOBER 5, 2001
NEW ORLEANS

Abstract of Paper

Deadline for Submission June 1, 2001

Presenting Author, Name and Mailing Address:

Telephone: _____
Fax: _____
E-mail Address: _____

Presentation Preference: () Oral () Poster
Affiliation: () SOFT () non-SOFT Member

Co-author(s), Address(es), Business Affiliation

Has this paper been presented before? () Yes () No
Where and When? _____

Available Audio-visual Equipment: 35 mm slide projector
and pointer.

The abstract review committee reserves the right of final
placement of the paper. The presenting authors of all papers
are required to register for the meeting.

Signature of submitting author