

# Table of Contents

## General Information

Hotel Maps and Meeting Room Locations . . . . .	3
Housing Map and Hotel Listings . . . . .	11
Registration Area and Committee or Society Tables . . . . .	13
While at JSM . . . . .	14
Meetings and Sessions . . . . .	15
Before Leaving JSM . . . . .	18
Hours of Operation . . . . .	19

Keynote Speakers . . . . .	21
----------------------------	----

## Committees

2006 Program Committee . . . . .	22
Advisory Committee on Continuing Education . . . . .	22
Local Area Committee . . . . .	23

## Association Officers

ASA . . . . .	24
ENAR . . . . .	25
WNAR . . . . .	26
SSC . . . . .	26
IMS . . . . .	27

Continuing Education at a Glance . . . . .	28
--	----

Computer Technology Workshops at a Glance . . . . .	29
---	----

## Career Placement Service

Floor Plan . . . . .	31
Employers Listing . . . . .	31

## Exhibits

Listing of Exhibitors by Booth Number . . . . .	32
Exhibit Floor Plan . . . . .	33
Listing of Exhibitors by Name . . . . .	34
Who's Who in the Exhibit Hall . . . . .	35

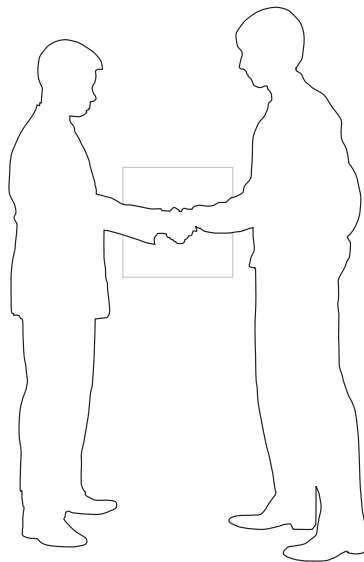
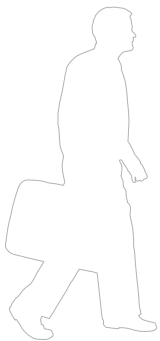
## General Program Schedule

Thursday, August 3 . . . . .	41
Friday, August 4 . . . . .	41
Saturday, August 5 . . . . .	42
Sunday, August 6 . . . . .	43
Monday, August 7 . . . . .	81
Tuesday, August 8 . . . . .	129
Wednesday, August 9 . . . . .	177
Thursday, August 10 . . . . .	225

Index of Participants . . . . .	249
---------------------------------	-----

Index of Continuing Education Instructors . . . . .	272
---	-----

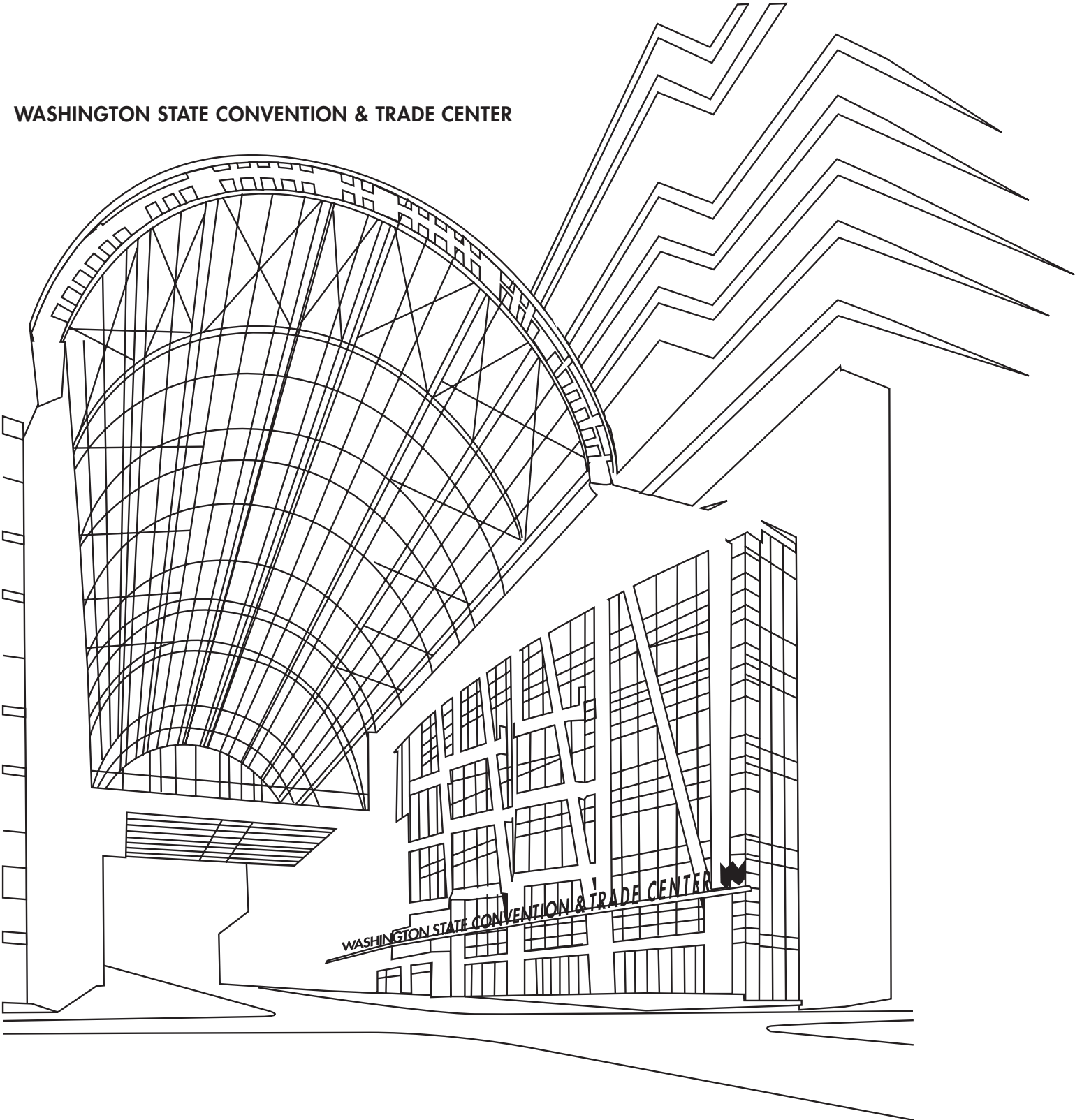
Advertising Index . . . . .	272
-----------------------------	-----



# General Information

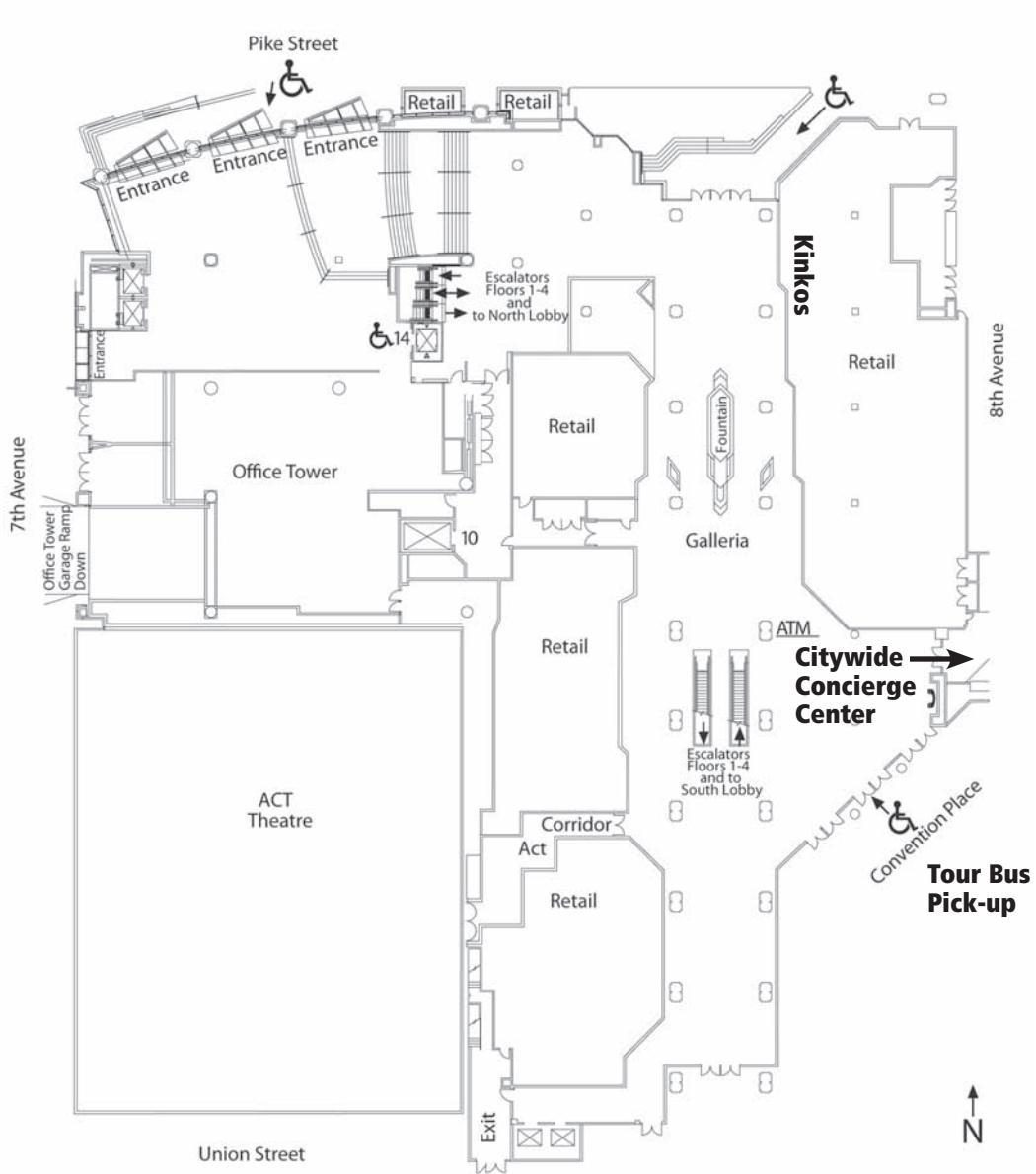
---

WASHINGTON STATE CONVENTION & TRADE CENTER



# Washington State Convention & Trade Center

Level 1



# Washington State Convention & Trade Center

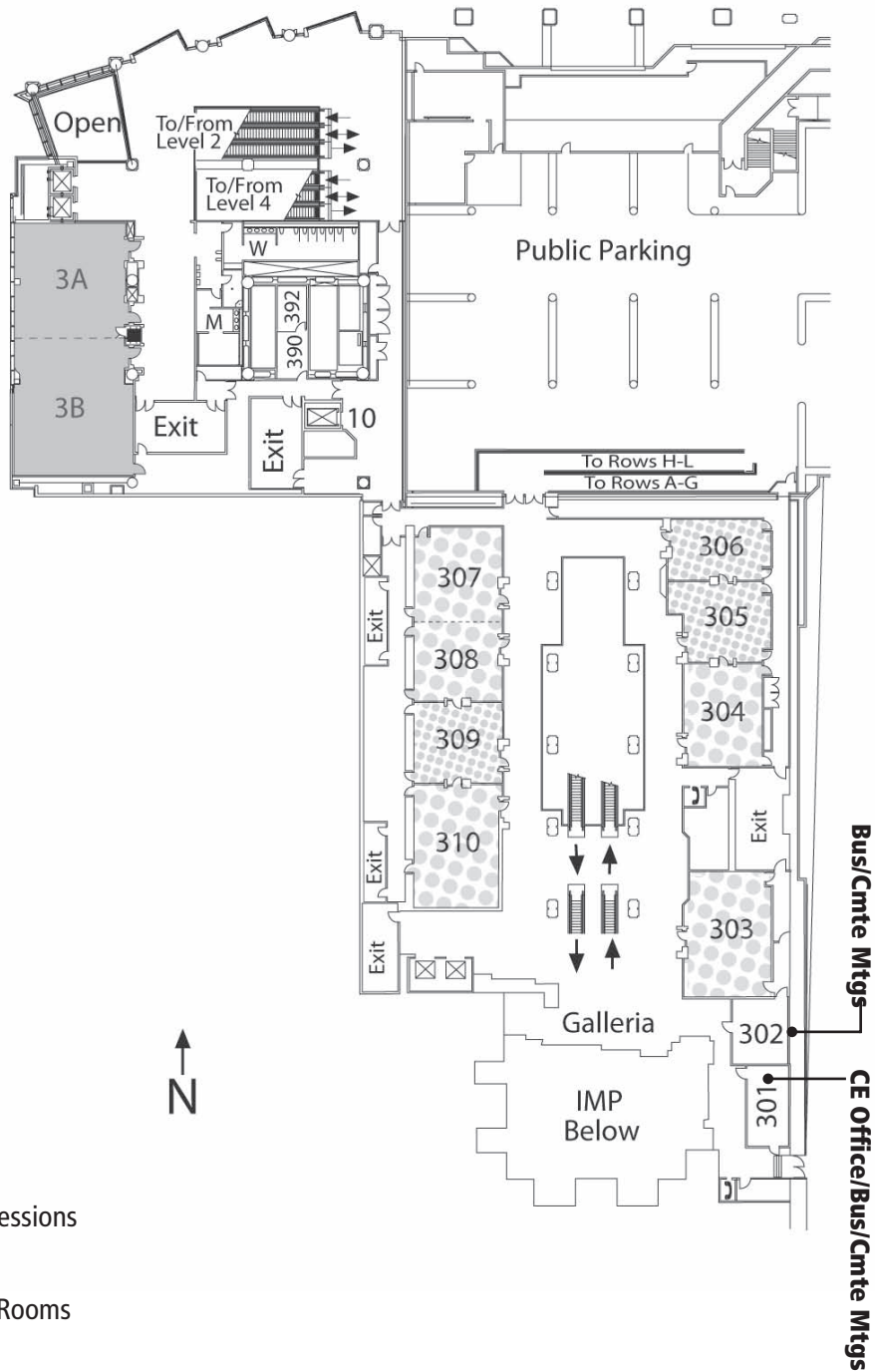
## Level 2



—Technical Sessions

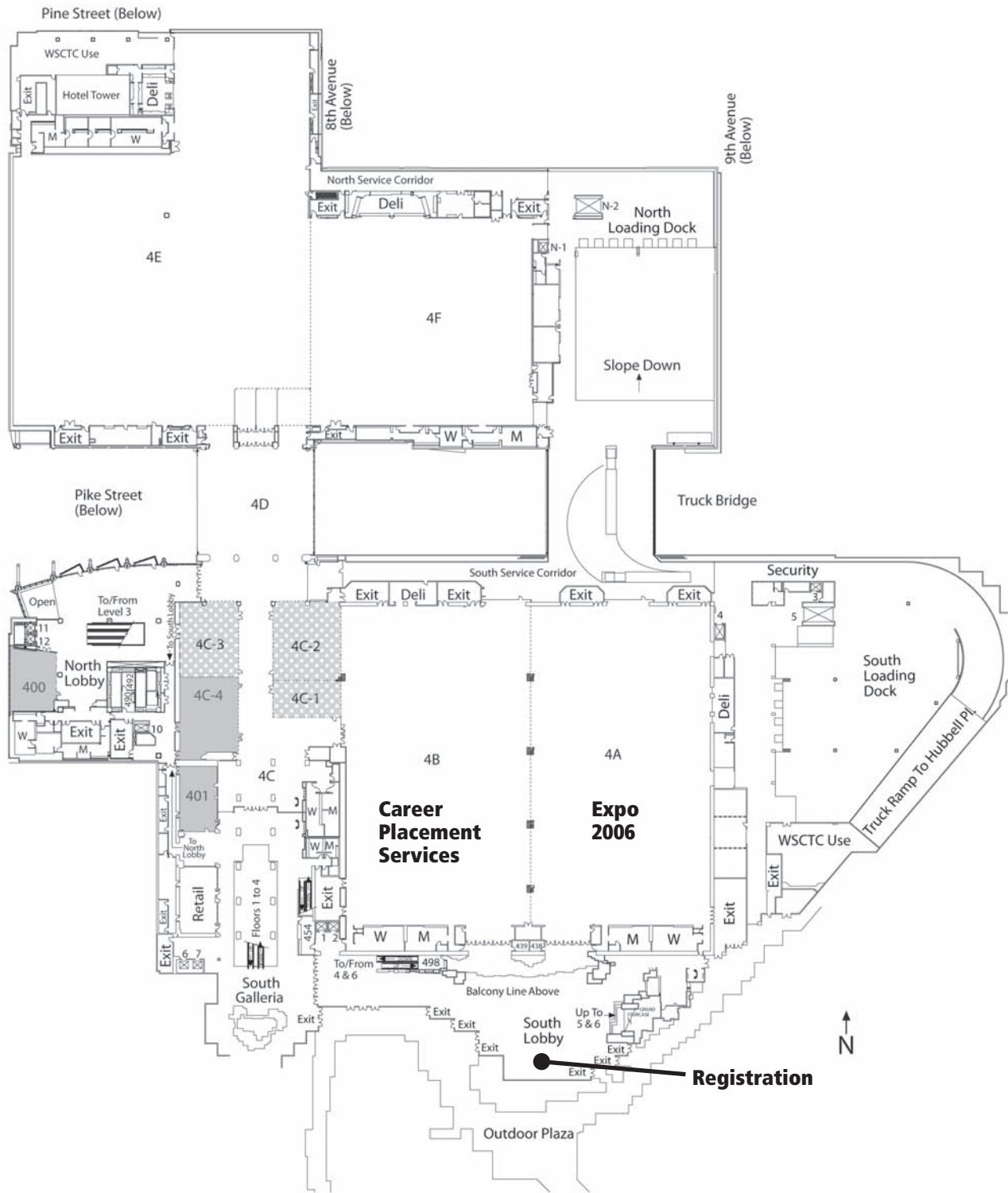
# Washington State Convention & Trade Center

## Level 3



# Washington State Convention & Trade Center

## Level 4

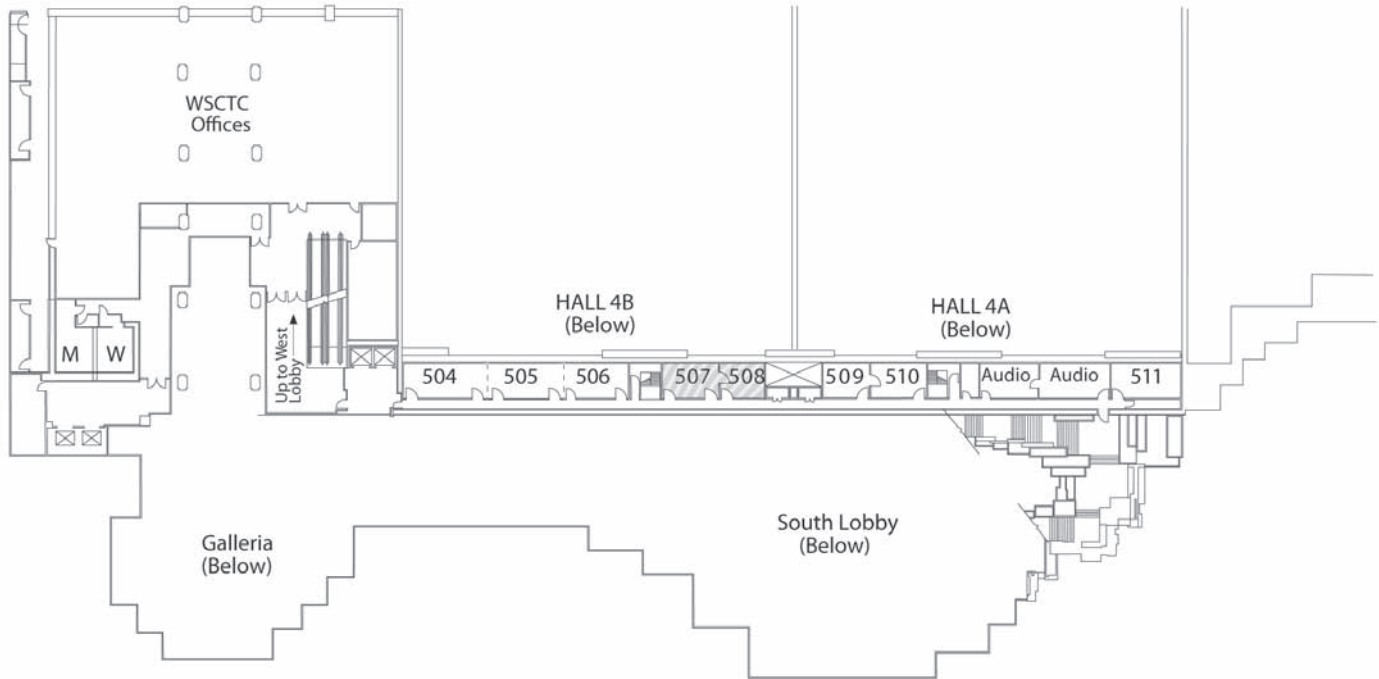



— Technical Sessions

— Roundtable/Speaker Luncheon Rooms & Bus/Cmte Mtgs

# Washington State Convention & Trade Center

## Level 5

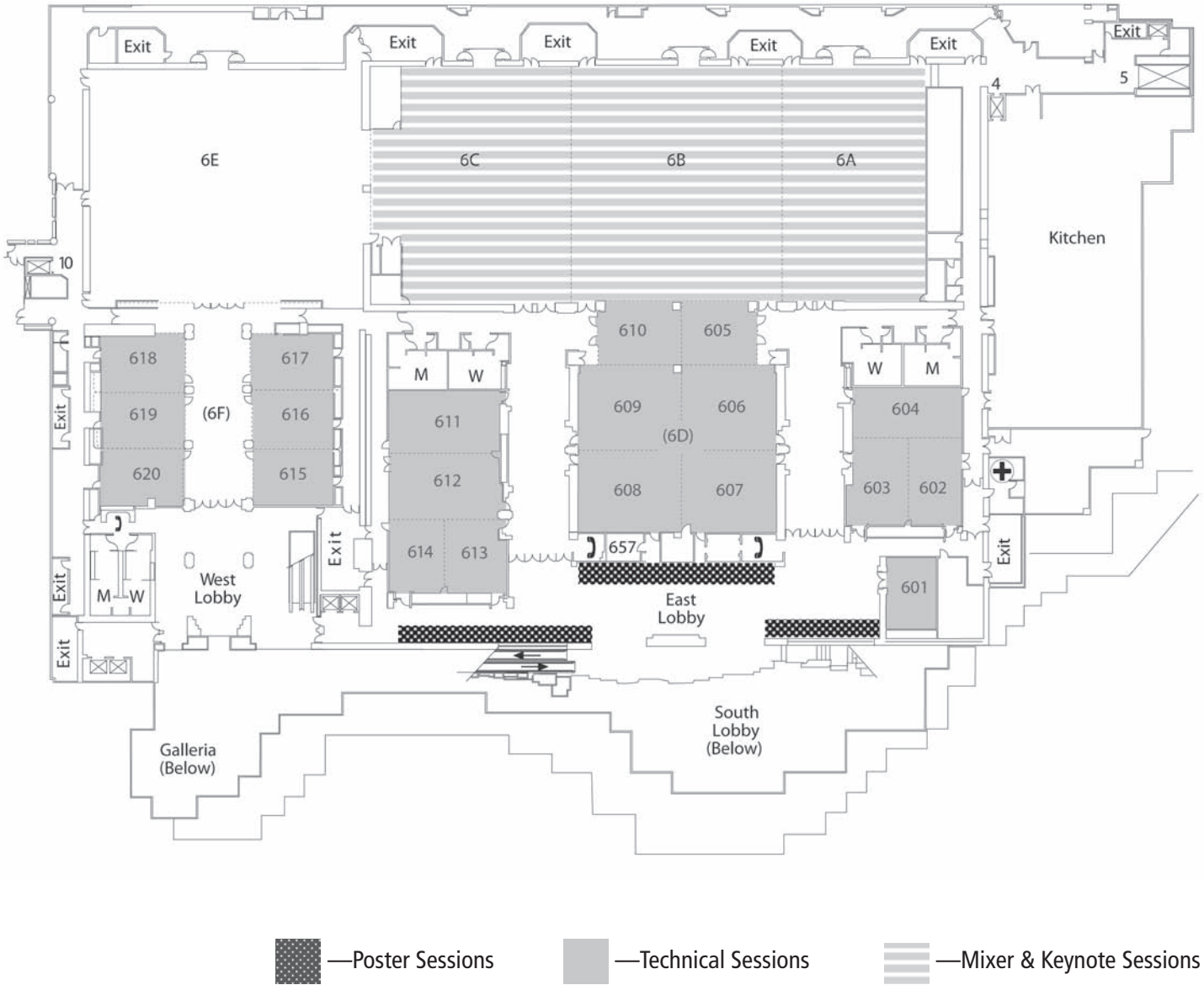


 —Speaker Workrooms



# Washington State Convention & Trade Center

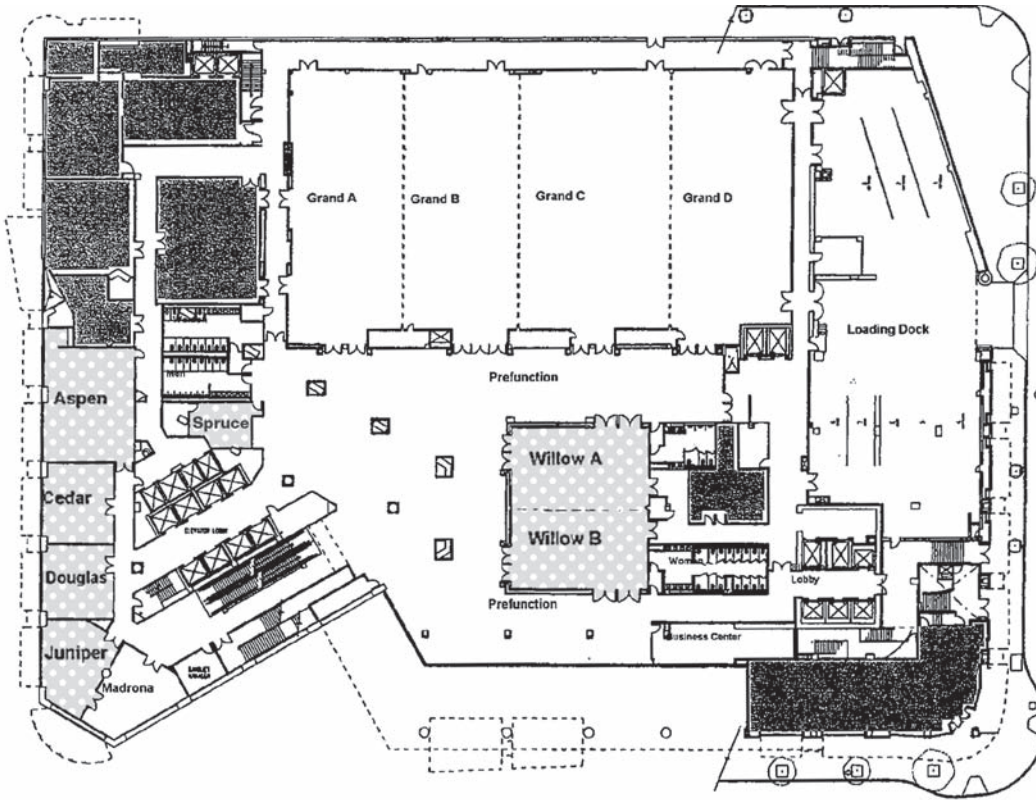
## Level 6





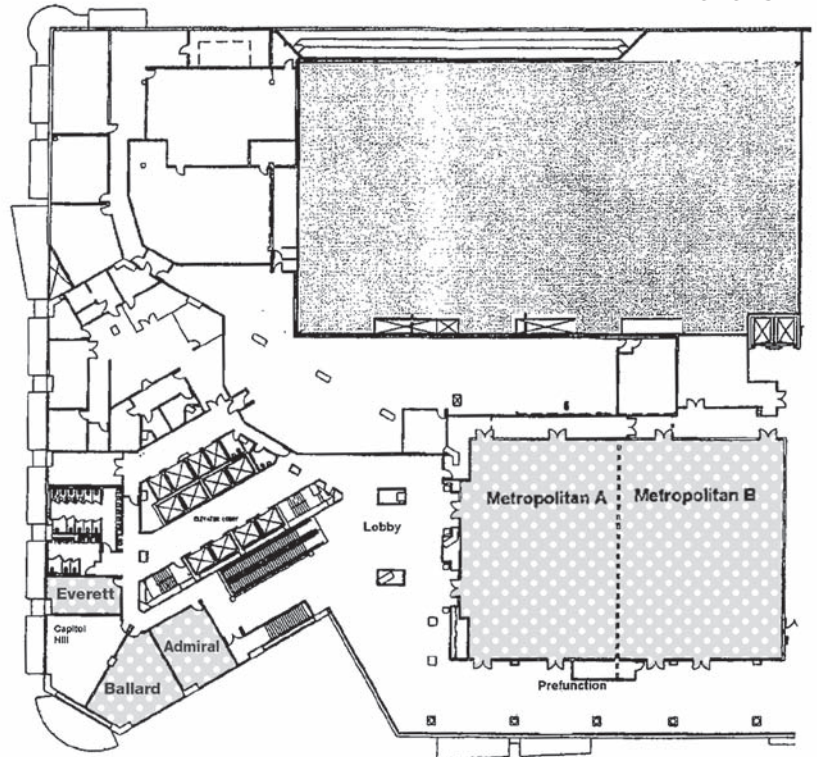
# Sheraton Seattle Hotel & Towers

Level 2



 —Business & Committee Meetings

Level 3

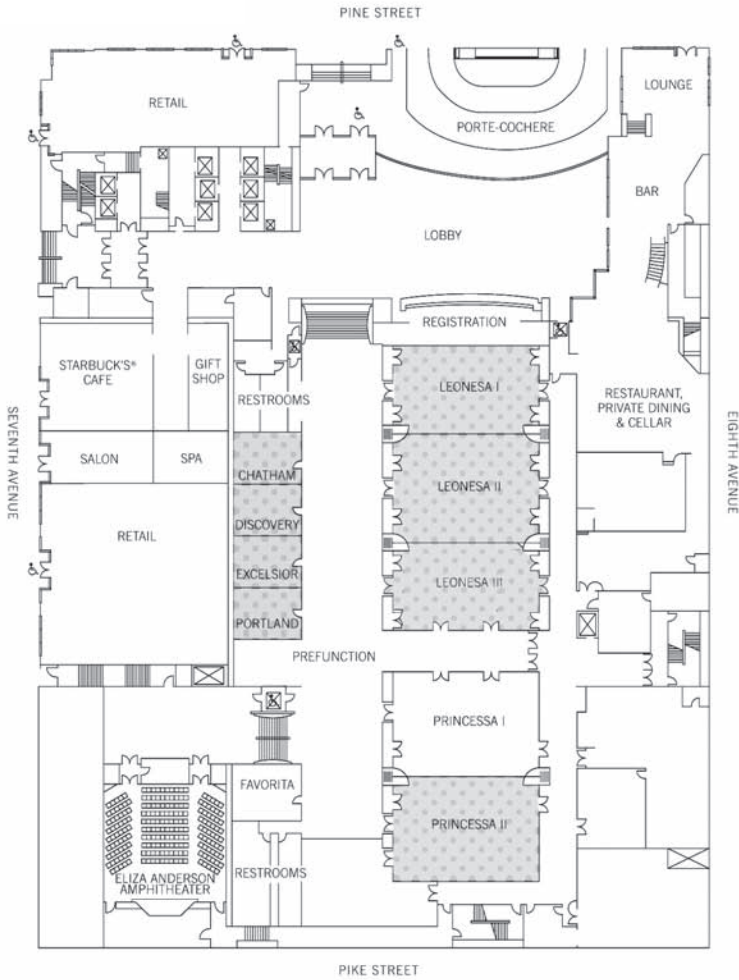


Level 35

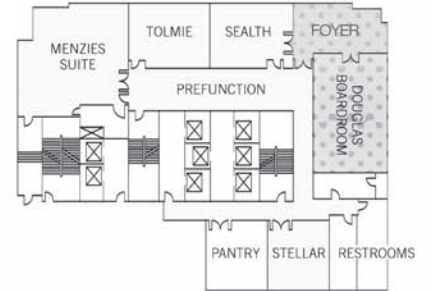


# Grand Hyatt Seattle

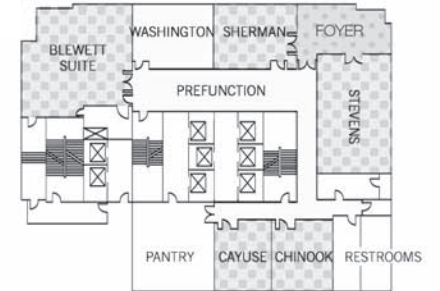
Level 1



Level 6



Level 7



—Business & Committee Meetings

# Housing Map and Hotel Listings

**1 Sheraton Seattle Hotel & Towers**

1400 Sixth Avenue  
COC/COS, committee, and social activities

**2 Grand Hyatt Seattle**

721 Pine Street  
Committee and social activities

**No scheduled activities**

**3 Summerfield Suites**

1011 Pike Street

**4 Red Lion Hotel on Fifth Avenue**

1415 Fifth Avenue

**5 The Roosevelt Seattle**

1531 Seventh Avenue

**6 The Paramount Hotel**

724 Pine Street

**7 Mayflower Park Hotel**

405 Olive Way

**8 Hilton Seattle**

1301 Sixth Avenue

**9 Crowne Plaza Seattle**

1113 Sixth Avenue

**10 Executive Hotel Pacific**

400 Spring Street

**11 Renaissance Seattle Hotel**

515 Madison Street

**12 The Warwick Seattle Hotel**

401 Lenora Street

**13 Sixth Avenue Inn**

2000 Sixth Avenue

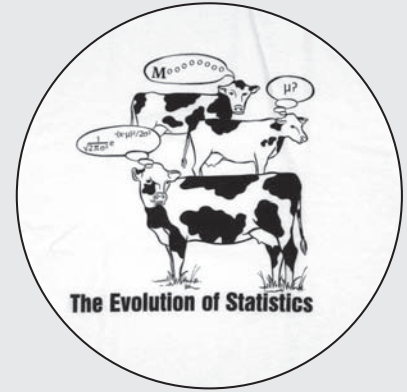
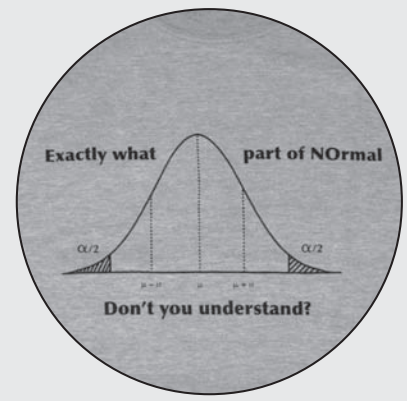
**14 Seattle University**

1111 E. Columbia, Bellarmine Hall

**15 Marriott SpringHill Suites**

1800 Yale Avenue





*American Statistical Association*

# MARKET PLACE

**LOCATED IN THE MAIN  
REGISTRATION AREA**

**Saturday, Aug. 5**  
noon – 5:00 p.m.

**Sunday – Wednesday**  
Aug. 6 – Aug. 9  
9:00 a.m. – 5:00 p.m.

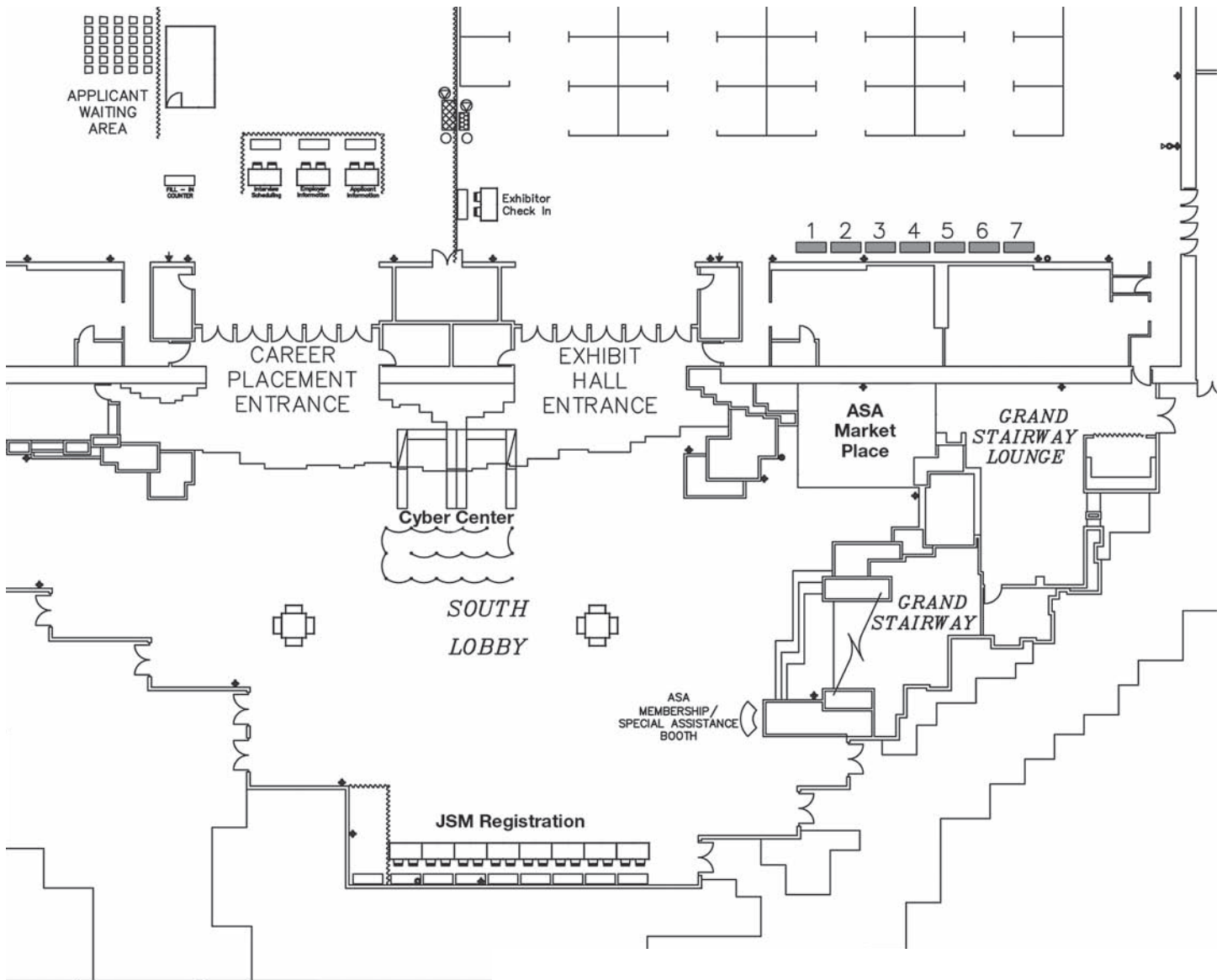
**Thursday, Aug. 10**  
8:00 – 10:30 a.m.

Mugs, hats, ASA apparel, children's shirts, JSM shirts, pens,  
**and more!**



# JSM Registration Area Floor Plan and Committee or Society Tables

Washington State Convention & Trade Center—Level 4



■ —Committee or Society Tables

1. Caucus for Women in Statistics
2. Christian Statisticians
3. Federal Committee on Statistical Methodology (FCSM)
4. Gay and Lesbian Concerns in Statistics
5. International Chinese Statistical Association (ICSA)
6. International Indian Statistical Association (IISA)
7. International Statistical Institute (ISI)

## While at JSM...



### Emergency Telephone Messages

The general conference telephone number is (206) 219-4700. This will connect you to the JSM Special Assistance Desk and should only be used for emergency purposes. Emergency messages will be posted in the electronic JSM Cyber Center, located in the registration area at the Washington State Convention & Trade Center. All other calls or messages should be left in the attendee's guestroom on his/her voice mail.

### Convention Hotels

The main phone numbers for the convention hotels are:

Sheraton Seattle Hotel & Towers	(206) 621-9000
Grand Hyatt Seattle	(206) 774-1234
Summerfield Suites	(206) 682-8282
Red Lion Hotel on Fifth Avenue	(206) 971-8000
The Roosevelt Seattle	(206) 621-1200
The Paramount Hotel	(206) 292-9500
Mayflower Park Hotel	(206) 623-8700
Hilton Seattle	(206) 624-0500
Crowne Plaza Seattle	(206) 464-1980
Executive Hotel Pacific	(206) 623-3900
Renaissance Seattle Hotel	(206) 583-0300
The Warwick Seattle Hotel	(206) 443-4300
Sixth Avenue Inn	(206) 441-8300
Seattle University, Bellarmine Hall	(206) 296-5620
Marriott SpringHill Suites	(206) 254-0500

### Assistance for Those with Disabilities

If you have a disability that may impede your participation, please contact a staff member at the Special Assistance Desk on Level 4, South Lobby, of the Washington State Convention & Trade Center.

### Child Care

While JSM will not have organized child care, services may be organized through PANDA Dial-a-Sitter. Child care providers will come to your hotel room; the rate is \$76 (plus parking) for four hours of service for up to two children, with an additional fee of \$14 per hour thereafter. With the addition of a third child, the fee is \$88 (plus parking) and \$16/hour after the four-hour minimum. All three children cannot be under the age of 5. The fee for two families that want to share a sitter is decided on a case-by-case basis. For more information, call (206) 325-2327 or visit [www.seattlesbestchildcare.com](http://www.seattlesbestchildcare.com).

The Caucus for Women in Statistics will provide a subsidy toward four hours of babysitting per family for up to 14 families. For details, contact Mary Gray at [mgray@american.edu](mailto:mgray@american.edu).

### Electronic Devices

Please turn off all cell phones, pagers, and other electronic devices before attending any JSM session. These devices cause interference with the audiovisual equipment and are a distraction to the session speakers and attendees.

### No Smoking Policy

For the comfort and health of all attendees, smoking is not permitted at any JSM function. This includes plenary sessions, concurrent sessions, workshops, luncheons, and receptions (unless the event is outside).

### Photographs and Videotaping

Taking photographs or using video equipment in any session or at any JSM event is prohibited, and violators will be asked to leave. This is a disruption for the speakers, a distraction for the audience, and an infringement on intellectual property rights. Only the official JSM photographer will be authorized to take photographs.

### Recycling at JSM

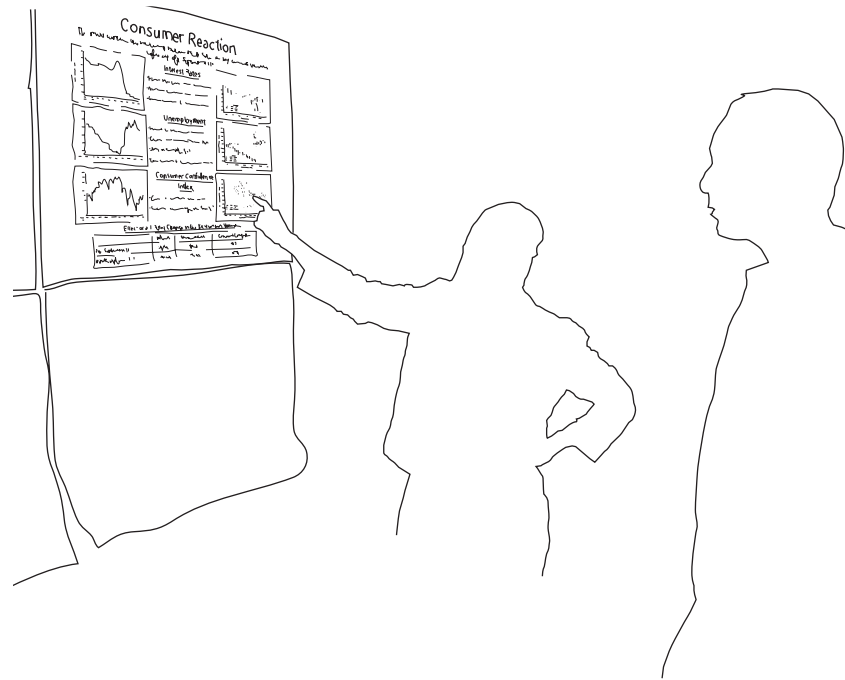
Your participation can make the difference. You can help by making use of the paper, plastic, aluminum, and glass trash containers in the lobby areas of the Washington State Convention & Trade Center. Also, participating in the towel and linen programs in use at the area hotels makes a significant impact on the amount of energy and water used. You also can change the option from print to not print or use the paper recycling containers available at the Cyber Center to help us continue our efforts to conserve. If you have additional questions, please stop by the Special Assistance Desk at the Washington State Convention & Trade Center registration area.

## Poster Sessions

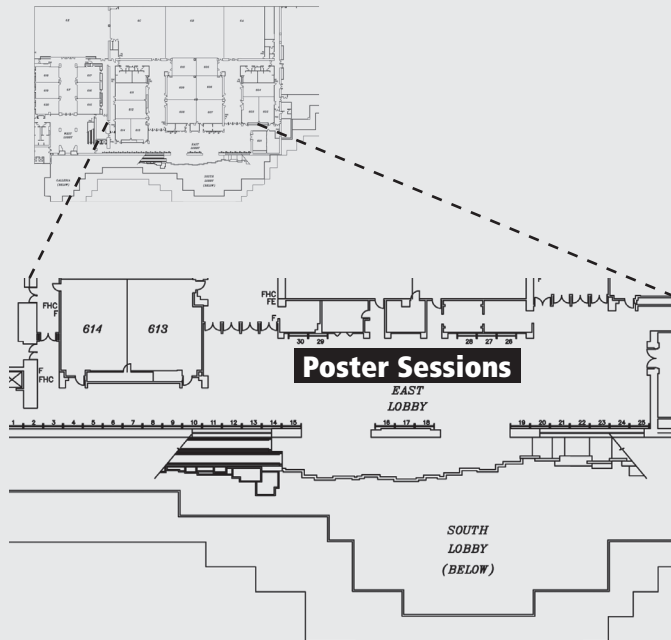
### CC – Level 6, East Lobby

Regular and topic-contributed poster sessions are held Sunday from 4:00 p.m.–5:50 p.m. and 8:00 p.m.– 9:50 p.m. and Monday, Tuesday, and Wednesday from 10:30 a.m.–12:20 p.m. and 2:00 p.m.–3:50 p.m. These sessions are designed for the display of graphical materials, charts, printouts, etc., rather than the text of the paper. Details are available in the general program schedule. Authors are assigned a poster board corresponding to the number in the program and will remain for the allotted time.

The Monday morning session includes the **Data Expo** competition entries, which provide graphical summaries of a NASA dataset containing geographic and atmospheric data. The competition is sponsored by the Sections on Statistical Graphics, Statistical Computing, and Statistics and the Environment.



## Poster Session Location



Washington State Convention & Trade Center  
Level 6, East Lobby

## Introductory Overview Lectures

The Introductory Overview Lectures are a series of talks on a variety of topics. No pre-registration is necessary, and they are open to all JSM registrants. If you have suggestions for next year, please contact 2007 JSM Program Chair Allan Rossman at [arossman@calpoly.edu](mailto:arossman@calpoly.edu).

- |   |         |
|---|---------|
| Sunday, August 6, 2:00 p.m. - 3:50 p.m.                                       | CC-4C-4 |
| <b>Session 1</b> <i>Genetic Association Studies</i>                           |         |
| Sunday, August 6, 4:00 p.m. - 5:50 p.m.                                       | CC-4C-4 |
| <b>Session 38</b> <i>Adaptive Designs/Interim Pilots and Regression Trees</i> |         |
| Monday, August 7, 8:30 a.m. - 10:20 a.m.                                      | CC-400  |
| <b>Session 83</b> <i>Statistical Consulting</i>                               |         |
| Tuesday, August 8, 8:30 a.m. - 10:20 a.m.                                     | CC-4C-4 |
| <b>Session 219</b> <i>Computer Experiments</i>                                |         |
| Wednesday, August 9, 8:30 a.m. - 10:20 a.m.                                   | CC-4C-4 |
| <b>Session 355</b> <i>Image Statistics and Bootstrap</i>                      |         |



## Late-Breaking Sessions

The JSM partner societies recently approved two additional session slots for special invited late-breaking sessions to cover important topics that might emerge close in time to each JSM. This is an exciting addition to the JSM program, most of which is organized well in advance.

Monday, August 7, 2:00 p.m. – 3:50 p.m. CC - 4C-4  
**Session 173** *Statistical/Mathematical Challenges in Biodefense Immune Modeling*

Wednesday, August 9, 8:30 a.m. – 10:20 a.m. CC-400  
**Session 354** *What Is the Role of Statistics in Public Policy Debates about Climate Change?*

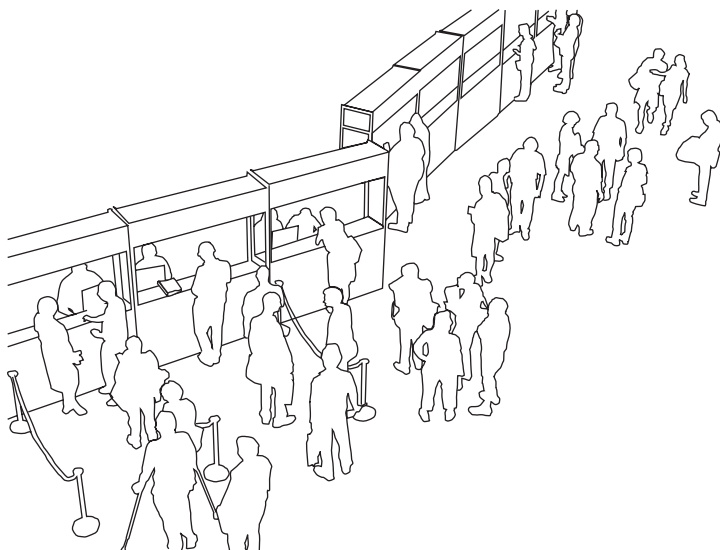
## Business and Committee Meetings

All meetings are open unless shown as “closed” or “by invitation only.” Section business meetings are open to all, and members are urged to attend. The business meetings of ASA Sections provide the opportunity for JSM attendees to give suggestions about Section business.

## Opening Mixer

CC – Ballroom 6ABC

Don't miss your chance to get JSM 2006 off to a great start while enjoying refreshments with your colleagues. Join us Sunday, August 6, from 8:00 p.m. - 10:30 p.m. Based on last year's success, a poster session will be on display during the mixer in the East Lobby. We will see you there!



## Student Mixer

S – Metropolitan Ballroom B

Student registrants can enjoy refreshments, meet their peers, and make plans for local events and outings at this mixer, Monday, August 7, from 6:00 p.m. – 7:30 p.m. The 2006 Student Mixer is sponsored by the ASA Committee on Membership Retention and Recruitment. A number of door prizes will be given away. Students, you don't want to miss it!

## Society Business Meetings

You are encouraged to attend your society business meetings, if held during JSM. This is your chance to give your input to the officers and other members of your society.

**American Statistical Association** CC-612  
Sunday, August 6, 6:00 p.m. – 7:30 p.m.

**Statistical Society of Canada Reception** H-Princessa II Ballroom  
Monday, August 7, 5:00 p.m. – 7:00 p.m.

**IMS Member Reception** S-Aspen  
Monday, August 7, 5:30 p.m. – 7:00 p.m.

**International Biometric Society, ENAR Business Meeting** CC-604  
Tuesday, August 8, 5:30 p.m. – 7:00 p.m.

**IMS New Member & Student Reception** S-Willow A  
Tuesday, August 8, 5:30 p.m. – 6:30 p.m.



# Gertrude Cox Scholarship Race

## 5K Race and 2.5K Fun Run/Walk

### Tuesday, August 8

The Caucus for Women in Statistics, in conjunction with the ASA, presents the 17th annual Gertrude Cox Scholarship Race at the Joint Statistical Meetings in Seattle, Washington. All proceeds will benefit the Gertrude M. Cox Scholarship in Statistics.

**The Race:** Two races running concurrently—a competitive 5K and a 2.5K fun run/walk

**When:** Tuesday, August 8, at 7:00 a.m.

**Where:** Location and logistical information will be posted at the caucus table in the exhibit hall, Hall 4A, Level 4 of the Washington State Convention & Trade Center.

**How Much:** The entry fee is **\$20**.

**Registration:** Those interested in participating are encouraged to register early. You may register at the hospitality table for the Caucus for Women in Statistics in the exhibit hall, Hall 4A, Level 4 of the Washington State Convention & Trade Center. All participants must sign a registration form and waiver. T-shirts for all preregistered runners will be distributed at the race. If you have questions, please contact Lori Thombs at [thombsl@missouri.edu](mailto:thombsl@missouri.edu) or (573) 882-3844.

---

## REGISTRATION FORM (each participant must complete and sign form)

Name \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_ State/Province \_\_\_\_\_ ZIP/Postal Code \_\_\_\_\_

Phone \_\_\_\_\_

Gender  M  F Age \_\_\_\_\_

Event  5K Race  2.5K Fun Run/Walk

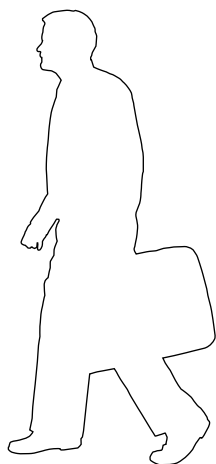
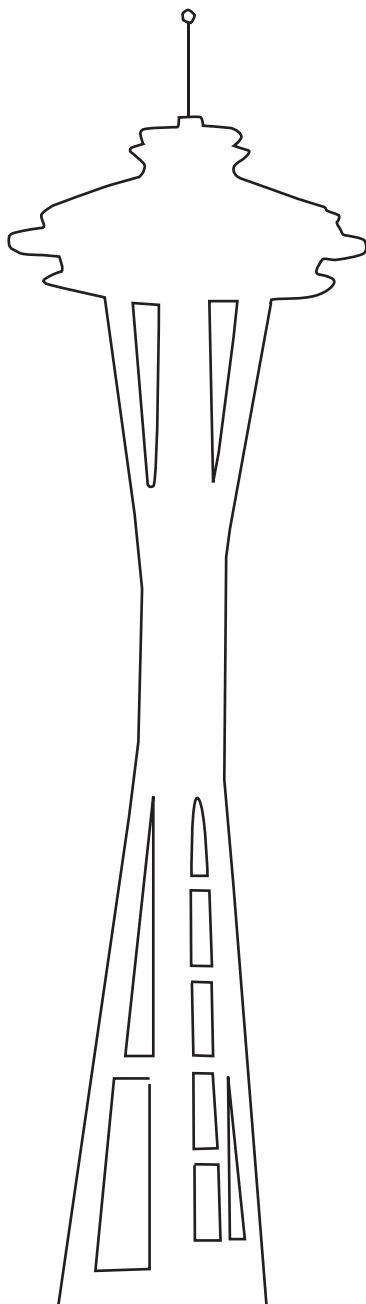
T-shirt size  L  XL

**The fine print.** I understand that running a road race is a potentially hazardous activity. I will not enter and run unless I am medically able and properly trained. I agree to abide by any decision of a race official relative to my ability to complete the run safely. I assume all risks associated with running in this event, including—but not limited to—falls, contact with other participants, effects of weather, traffic, and course conditions. All such risks are known and appreciated by me. Having read this waiver, knowing these facts, and in consideration of your accepting my entry, I, for myself and anyone entitled to act on my behalf, waive and release the race directors, the race committee, and all sponsors from all claims of liabilities of any kind arising out of my participation in this event, even though such liability may arise as a result of negligence or carelessness on the part of the persons named in this waiver.

Signature \_\_\_\_\_ Date \_\_\_\_\_

Parent or guardian (if under 18) \_\_\_\_\_

Make check payable to **The Gertrude Cox Scholarship Fund**. Please return this form along with your check to Lori Thombs, Race Organizer, Department of Statistics, University of Missouri, Middlebush 146, Columbia, MO 65211, or fax to (573) 884-5524.



## Recycling Badge Holders

JSM badges and badge holders will be collected for recycling. Please place those you are not reusing into a designated bin in the registration area.

new  
Proceedings  
policy

## 2006 JSM Proceedings

A copy of the 2006 Proceedings CD-ROM is included with most registration types; however, additional copies may be ordered by calling (888) 231-3473 or visiting [www.amstat.org/asastore](http://www.amstat.org/asastore). CDs will mail in early 2007.

Anyone who orally presents a paper, panel, or poster during JSM is eligible to submit a paper for publication on the 2006 Proceedings CD-ROM. For information about submitting a paper, visit [www.amstat.org/meetings/jsm/2006/index.cfm?fuseaction=proceedings](http://www.amstat.org/meetings/jsm/2006/index.cfm?fuseaction=proceedings). Papers may be submitted from August 1–October 20 and must be in electronic format.

## JSM 2007

The 2007 Joint Statistical Meetings will be held in Salt Lake City, Utah, July 29–August 2, at the Salt Palace Convention Center. Preliminary information about JSM 2007 can be found at the Salt Lake Booth, #109, at this year's EXPO. The complete listing of the 2007 Program Committee and instructions for submitting contributed papers appeared in the June issue of *Amstat News* and can be found at [www.amstat.org/meetings/jsm/2007](http://www.amstat.org/meetings/jsm/2007).

## If You Are Not a Member...

Information about the ASA, ENAR, WNAR, IMS, and SSC will be available at the society booths located in the exhibit hall. Each society provides a variety of publications and activities to anyone interested in applied and/or theoretical statistics. Student membership is offered at substantially reduced rates.

If you are not already a member of the ASA, join now and receive a \$15 discount on your first year of Limited or Regular membership. Join at the ASA Membership/Special Assistance Desk in the registration area by Thursday, August 10, at 10 a.m. to receive your discount. This discount is valid for Limited or Regular memberships only. Ask about other discounted memberships for students, post-graduates, retirees, and developing country residents.

# Hours of Operation

## Registration

All persons attending JSM, including participants in the program, are required to register. Materials for all those who registered in advance are available at the JSM Registration Desk, located on Level 4, South Lobby, of the Washington State Convention & Trade Center. The ASA Membership/Special Assistance Desk also is located here. Additionally, you may add Continuing Education courses, the Career Placement Service, tours, guests, roundtables with coffee, and roundtables with lunch to your registration at the JSM Registration Desk. Hours of operation:

<b>Saturday, August 5</b>	<b>7:00 a.m. – 6:00 p.m.</b>
<b>Sunday, August 6</b>	<b>7:00 a.m. – 8:30 p.m.</b>
<b>Monday, August 7</b>	<b>7:30 a.m. – 6:00 p.m.</b>
<b>Tuesday, August 8</b>	<b>7:30 a.m. – 4:30 p.m.</b>
<b>Wednesday, August 9</b>	<b>7:30 a.m. – 4:30 p.m.</b>
<b>Thursday, August 10</b>	<b>7:30 a.m. – 10:30 a.m.</b>

JSM registration includes the program book and abstract book or CD, access to EXPO 2006, admission to the Opening Mixer (dry snacks, beer, and soft drinks), the Student Mixer (students only), and the Informal Dance Party (dry snacks and cash bar). If you did not purchase roundtable tickets with your advance registration, ask at the JSM Registration Desk for availability. Existing tickets will be sold until 2 p.m. on the day prior to the scheduled roundtable. NOTE: No onsite kosher or heart healthy meal tickets will be available.

## ASA Continuing Education Courses

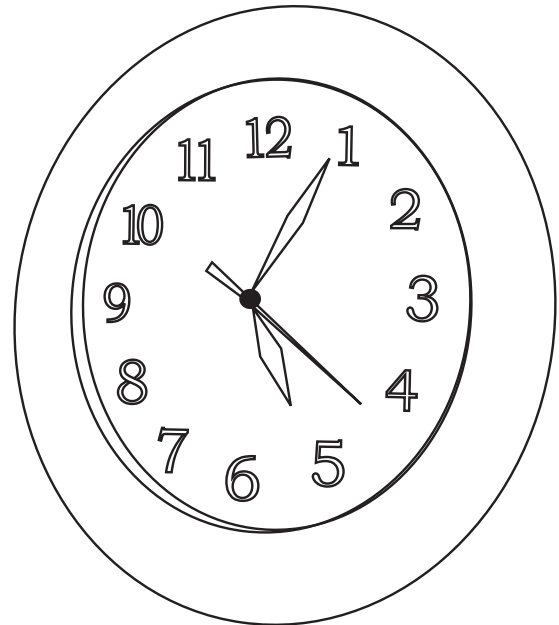
Courses will be held in rooms on Level 3 of the Washington State Convention & Trade Center. For room assignments, please review the general program or visit the Special Assistance Desk on Level 4, South Lobby, of the Washington State Convention & Trade Center.

Onsite CE Registration: Go to the JSM Registration Desk, located on Level 4, South Lobby, of the Washington State Convention & Trade Center. Availability may be limited, and textbooks will not be available.

## Speaker Work Rooms

There will be two speaker work rooms this year, both at the Washington State Convention & Trade Center, Level 5, in rooms 507 and 508. Hours of operation:

<b>Saturday, August 5</b>	<b>7:00 a.m. – 6:00 p.m.</b>
<b>Sunday, August 6</b>	<b>7:00 a.m. – 6:00 p.m.</b>
<b>Monday, August 7</b>	<b>7:00 a.m. – 6:00 p.m.</b>
<b>Tuesday, August 8</b>	<b>7:00 a.m. – 6:00 p.m.</b>
<b>Wednesday, August 9</b>	<b>7:00 a.m. – 6:00 p.m.</b>
<b>Thursday, August 10</b>	<b>7:00 a.m. – 10:30 a.m.</b>



A speaker work room is available for all presenters. There will be practice equipment available in each room. The practice equipment will consist of an overhead projector and screen and a data projector and screen. To accommodate more than 3,200 presenters, each speaker will be limited to 10 minutes to test the equipment. Please rehearse your verbal presentation in the privacy of your hotel room to ensure everyone has a chance to test the equipment.

Presenters using laptops for presentations are encouraged to report to the speaker work room for training on how to connect properly to the data projector. Audiovisual technicians will be available to assist with questions or problems.

## Career Placement Service

CC – Exhibit Hall 4B

The JSM 2006 Career Placement Service will be located in the Washington State Convention & Trade Center, Hall B. Hours of operation:

### Saturday, August 5

Job Posting and Résumé Submission Only 9:00 a.m. – 5:00 p.m.

### Sunday, August 6

Full Career Placement Service Open 1:00 p.m. – 6:00 p.m.

### Monday, August 7

Full Career Placement Service Open 8:00 a.m. – 6:00 p.m.

**Tuesday, August 8**

Full Career Placement Service Open 8:00 a.m. – 6:00 p.m.

**Wednesday, August 9**Full Career Placement Service Open 8:00 a.m. – 6:00 p.m.  
(Onsite registration closes at noon.)**EXPO 2006**

CC – Exhibit Hall 4A

Visit publishers, software companies, and recruiters. See state-of-the-art products designed for the statistical community.

**Exhibitors Move in and out Information**

Saturday, August 5

(exhibitor move in only) 8:00 a.m. – 5:00 p.m.

Sunday, August 6

(exhibitor move in only) 8:00 a.m. – 11:00 a.m.

Wednesday, August 9

(exhibitor move out only) 2:00 p.m. – 8:00 p.m.

**Show Hours of Operation**

<b>Sunday, August 6</b>	<b>1:00 p.m. – 6:00 p.m.</b>
<b>Monday, August 7</b>	<b>9:00 a.m. – 6:00 p.m.</b>
<b>Tuesday, August 8</b>	<b>9:00 a.m. – 6:00 p.m.</b>
<b>Wednesday, August 9</b>	<b>9:00 a.m. – 2:00 p.m.</b>

**Cyber Center**

CC – Level 4, South Lobby

There will be 20 terminals in the Cyber Center available for internet access and the electronic Message Center. The Cyber Center is for registered JSM attendees and will be located in the JSM registration area on Level 4, South Lobby, of the Washington State Convention &amp; Trade Center. There will NOT be 24-hour access to the Cyber Center. To reach an attendee when the Cyber Center is closed, please call his/her hotel directly. Hours of operation:

<b>Saturday, August 5</b>	<b>7:00 a.m. – 6:00 p.m.</b>
<b>Sunday, August 6</b>	<b>7:00 a.m. – 10:00 p.m.</b>
<b>Monday, August 7</b>	<b>7:00 a.m. – 10:00 p.m.</b>
<b>Tuesday, August 8</b>	<b>7:00 a.m. – 10:00 p.m.</b>
<b>Wednesday, August 9</b>	<b>7:00 a.m. – 10:00 p.m.</b>
<b>Thursday, August 10</b>	<b>7:00 a.m. – 10:30 a.m.</b>

**Wireless Internet Access**

The Washington State Convention &amp; Trade Center has wireless internet access in the following locations: 1st floor – Pike Street entrance; 2nd floor – International Meeting Place; 4th floor – South Escalator Landing; and 6th Floor – East and West lobbies. The cost is \$9.95 per day; call (206) 219-5644 for technical support.

**ASA Marketplace**

CC – Level 4, South Lobby

The ASA Marketplace is your store for JSM and ASA souvenirs. Purchase your official JSM 2006 T-shirt, new shirt designs, great new gifts, and clearance items. Hours of operation:

<b>Saturday, August 5</b>	<b>12:00 p.m. – 5:00 p.m.</b>
<b>Sunday, August 6</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Monday, August 7</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Tuesday, August 8</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Wednesday, August 9</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Thursday, August 10</b>	<b>8:00 a.m. – 10:30 a.m.</b>

**ASA Communities Booth Hours**

CC – Exhibit Hall 4A, Booth 101

Learn about the many programs available to you, including Chapters, Sections, career development, statistical education, and membership. Hours of operation:

<b>Sunday, August 6</b>	<b>1:00 p.m. – 6:00 p.m.</b>
<b>Monday, August 7</b>	<b>9:00 a.m. – 6:00 p.m.</b>
<b>Tuesday, August 8</b>	<b>9:00 a.m. – 6:00 p.m.</b>
<b>Wednesday, August 9</b>	<b>9:00 a.m. – 2:00 p.m.</b>

**Citywide Concierge Center**

CC – Level 1

The Citywide Concierge Center is operated by the Washington State Convention &amp; Trade Center and provides extensive information and referrals for restaurants, tours, and sightseeing—along with up-to-date maps and travel information. The center is located in the Main Lobby on Level 1 of the convention center. Hours of operation:

<b>Saturday, August 5</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Sunday, August 6</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Monday, August 7</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Tuesday, August 8</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Wednesday, August 9</b>	<b>9:00 a.m. – 5:00 p.m.</b>
<b>Thursday, August 10</b>	<b>9:00 a.m. – 5:00 p.m.</b>





## President's Invited Address

"A Data-Driven World: Why Now, and What Do We Do about It?"

Monday, August 7, 4:00 p.m.

### William R. Pulleyblank

Vice President, Center for Business Optimization, IBM Global Services, IBM Business Consulting Services

William R. Pulleyblank is the vice president of the Center for Business Optimization within IBM Business Consulting Services. He has served on a number of boards, advisory panels, and editorial boards. His research interests are in operations research, combinatorial optimization, and applications of optimization.



## Deming Lecture

"Making Another World: a Holistic Approach to Performance Improvement"

Tuesday, August 8, 4:00 p.m.

### Ronald D. Sneec

Tunnell Consulting

Ron Sneec is principal of Process and Organizational Excellence at Tunnell Consulting. Sneec received his BA in mathematics from Washington and Jefferson College and MS and PhD degrees from Rutgers University in applied and mathematical statistics. He is a Fellow of the American Statistical Association, American Society of Quality, and the American Association for the Advancement of Science. His work has been recognized by 20 major awards and medals. He has published four books and more than 165 papers in the fields of performance improvement, statistics, quality, and management.



## ASA Presidential Address

"From Data to Policy: Scientific Excellence Is Our Future"

Tuesday, August 8, 8:00 p.m.

### Sallie Keller-McNulty

Rice University

Sallie Keller-McNulty is dean of the George R. Brown School of Engineering, professor of statistics, and the E.D. Butcher Chair of Engineering at Rice University in Houston, Texas. She is also Fellow and president of the American Statistical Association, was named fellow of the American Association for the Advancement of Science, and is a recipient of the ASA's Founders Award. She has more than 60 statistical science publications. Her areas of research are uncertainty quantification, computational and graphical statistics and related software and modeling techniques, and data access and confidentiality.



## COPSS Fisher Lecture

"Recombination and Linkage"

Wednesday, August 9, 4:00 p.m.

### Terence P. Speed

University of California, Berkeley

While working toward his PhD in mathematics at Monash University, Terence P. Speed was in close contact with population genetics and heard much about Fisher's work in that area, but his research was in algebra. His first academic job was at the University of Sheffield, where he fell in love with sufficiency and dipped more deeply into Fisher's works. In 1997, he took up a 50% appointment in medical research at the University of Melbourne. Since then, he has divided his time as follows: 50% Berkeley, 50% Melbourne, and 50% in the air. Statistics, genetics, and molecular biology are among his major research interests.

## Advisory Committee on Continuing Education

**Charles Yun Tan, Chair**  
Merck & Co., Inc.

**Katherine T. Halvorsen**  
Smith College

**Gordon J. Johnston**  
SAS Institute

**Nandini Kannan**  
University of Texas

**Eileen C. King**  
Procter & Gamble

**Andy Mauromoustakos**  
University of Arkansas

**Leonard Oppenheimer**  
J&J PRD

**Xiaoming Sheng**  
University of Utah

**Clyde Tucker**  
Bureau of Labor Statistics

## ASA Continuing Education

**Madge Haven**  
Education Programs Administrator

**Rick Peterson**  
Education Programs Administrator

## ASA Meetings

**Elaine L. Powell, CMP**  
Assistant Director of Meetings

**Kathleen Wert**  
Meetings Planner

**Donna R. Arrington**  
Meetings Planner

American Statistical Association  
Email: [jsm@amstat.org](mailto:jsm@amstat.org)  
Web: [www.amstat.org](http://www.amstat.org)

# 2006 PROGRAM COMMITTEE



JSM 2006 Program Chair  
**Lisa M. LaVange**  
The University of North Carolina



International Biometric Society (ENAR)  
**Brent Coull**  
Harvard School of Public Health



International Biometric Society (WNAR)  
**Gabriel Huerta**  
University of New Mexico



Statistical Society of Canada (SSC)  
**Georgia Roberts**  
Statistics Canada



Council of Chapters, ASA  
**James R. Kenyon**  
Bristol-Myers Squibb Company



Committee on Committees, ASA  
**Margo J. Anderson**  
University of Wisconsin-Milwaukee



Invited and Contributed Posters  
**Maura E. Stokes**  
SAS Institute



Section on Bayesian Statistical Science, ASA  
**Steven N. MacEachern**  
The Ohio State University



Biometrics Section, ASA  
**Michael J. Daniels**  
University of Florida



Statistical Computing Section, ASA  
**Michael W. Trosset**  
College of William and Mary



Section on Statistical Consulting, ASA  
**Todd G. Nick**  
Cincinnati Children's Hospital Medical Center



Section on Statistics in Defense and National Security, ASA  
**Wendy Martinez**  
Office of Naval Research



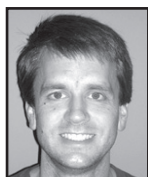
Section on Epidemiology, ASA  
**Lisa M. Sullivan**  
Boston University



Section on Government Statistics, ASA  
**Michael P. Cohen**  
Bureau of Transportation Statistics



Section on Statistical Graphics, ASA  
**Juergen Symanzik**  
Utah State University



Section on Nonparametric Statistics, ASA  
**Todd Ogden**  
Columbia University



Section on Physical & Engineering Sciences, ASA  
**Thomas M. Loughin**  
Kansas State University



Section on Quality & Productivity, ASA  
**Martha M. Gardner**  
General Electric Global Research





Institute of Mathematical Statistics (Invited)  
**Christopher Genovese**  
 Carnegie Mellon University



Institute of Mathematical Statistics (Contributed)  
**Jennifer Hoeting**  
 Colorado State University



Section on Statistics in Sports, ASA  
**Kara L. Morgan**  
 IBM



General Methodology, ASA  
**Barry Graubard**  
 National Cancer Institute



General Methodology, ASA  
**Jianwen Cai**  
 The University of North Carolina



Section on Survey Research Methods, ASA  
**David R. Judkins**  
 Westat



Biopharmaceutical Section, ASA  
**B. Christine Clark**  
 ICON Clinical Research



Business & Economic Statistics Section, ASA  
**Margaret Land**  
 Texas A&M University, Kingsville



Section on Teaching Statistics in the  
 Health Sciences, ASA  
**Janet Tooze**  
 Wake Forest University



Section on Statistical Education, ASA  
**Paul J. Roback**  
 St. Olaf College



Section on Statistics and the Environment, ASA  
**Estelle Russek-Cohen**  
 U.S. Food and Drug Administration



Section on Health Policy Statistics, ASA  
**Christopher H. Schmid**  
 Tufts-New England Medical Center



Section on Statistics in Marketing, ASA  
**Andrew Ainslie**  
 UCLA Anderson School of Management



Section on Risk Analysis, ASA  
**Ingo Ruczinski**  
 The Johns Hopkins University



Social Statistics Section, ASA  
**Juanita Tamayo Lott**  
 U.S. Census Bureau

## Local Area Committee

**Dan Fitzsimmons**  
 Boeing, Cochair

**Tim Hesterberg**  
 Insightful Corporation, Cochair

**Bruce Peters**  
 TerraStat

**Christian K. Hansen**  
 Eastern Washington University

**JoAnna Scott**  
 University of Washington

**I-li Lu**  
 Boeing

**Jim Ward**  
 Sand Point Statistics Group

**Winson Taam**  
 Boeing

**Brian Leroux**  
 University of Washington

**Martin Meckesheimer**  
 Boeing

**Aileen Murphy**  
 ZymoGenetics

**Paul Below**  
 IEEE Computer Society

**Paul Ross**  
 Industrial and Organizational  
 Psychologist (retired)

**Sabyasachi (Shobbo) Basu**  
 Boeing

**Shuguang Song**  
 Boeing

**Stephen Kaluzny**  
 Insightful Corporation

**Dane Wu**  
 Pacific Lutheran University

**Anne York**  
 York Data Analysis

**Catherine White**  
 University of Washington

# 2006 Association Officers

---

## American Statistical Association

President

**Sallie Keller-McNulty**

President-Elect

**Mary Ellen Bock**

Past President

**Fritz J. Scheuren**

Vice Presidents

**George W. Cobb**

**Daniel Kasprzyk**

**Robert Rodriguez**

Secretary

**William B. Smith**

Treasurer

**Sastry G. Pantula**

Council of Chapters Representatives

**Joan S. Chmiel**

**Katherine Monti**

**June Morita**

Council of Sections Representatives

**Ronald Fecso**

**Ralph O'Brien**

**Nathaniel Schenker**

Publications Representative

**Edward Wegman**

International Representative

**Denise Lievesley**

Editors, *Journal of the American Statistical Association*

Coordinating and Applications and Case Studies:

**Mark S. Kaiser**

Theory and Methods:

**Stephen Portnoy** and **Walter Piegorsch**

Book Reviews:

**Robert Lund**

Editor, *The American Statistician*

**Peter Westfall**

Editor, *CHANCE*

**Michael Lavine**

Editors, *Current Index to Statistics*

**George Styan**, Abstracting Editor

**David James**, Database Editor

Editor, *Journal of Agricultural, Biological,  
and Environmental Statistics*

**Byron J. T. Morgan**

Editor, *Journal of Business & Economic Statistics*

**Torben G. Andersen**

Editor, *Journal of Computational and Graphical Statistics*

**Luke Tierney**

Editor, *Journal of Educational and Behavioral Statistics*

**David M. Thissen**

Editor, *STATS: The Magazine for Students of Statistics*

**Paul J. Fields**

Editor, *Technometrics*

**Randy Sitter**

Editors, *Amstat Online*

**Martha Aliaga**

**William B. Smith**

Editor, *Journal of Statistics Education*

**W. Robert Stephenson**

Editor, ASA/SIAM Book Series

**Martin T. Wells**

Editor, *Statistics in Biopharmaceutical Research*

**Joseph F. Heyse**

Council of Chapters Chair

**Ronald L. Wasserstein**

Council of Sections Chair

**John E. Boyer**

### **Business Office**

William B. Smith, Executive Director

American Statistical Association

732 North Washington Street

Alexandria, VA 22314-1943

Phone: (703) 684-1221

Fax: (703) 684-6456

Email: [asainfo@amstat.org](mailto:asainfo@amstat.org)

Web: [www.amstat.org](http://www.amstat.org)



# International Biometric Society—Eastern North American Region

January – December 2006

President  
**Jane Pendergast**

Past President  
**Peter Imrey**

President-Elect  
**Lisa LaVange**

Secretary (2004–2006)  
**Lance Waller**

Treasurer (2004–2006)  
**Oliver Schabenberger**

## Regional Committee (RECOM)

President (Chair): **Jane Pendergast**

Six ordinary members (elected to three-year terms):  
RAB Chair: **Scarlett Bellamy**

2004–2006	2006–2007	2006–2008
<b>Bruce Craig</b>	<b>Gregory Campbell</b>	<b>A. John Bailor</b>
<b>Amita Manatunga</b>	<b>Naisyin Wang</b>	<b>Stacy Linborg</b>
		<b>Tom TenHave</b>

Regional Members of the Council of the International Biometric Society  
**Ron Brookmeyer, Marie Davidian, Walter W. Piegorsch, Louise Ryan, Janet Wittes**

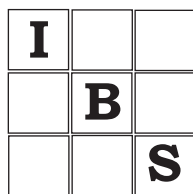
Appointed Members of the Regional Advisory Board (three-year terms)  
Chair: **Stacy Lindborg**

2004–2006	2006–2007	2006–2007
<b>Hongshik Ahn</b>	<b>Barbara Bailey</b>	<b>Michael Hardin</b>
<b>Brent Coull</b>	<b>Sudipto Banerjee</b>	<b>Eileen King</b>
<b>Debashis Ghosh</b>	<b>Jason Conner</b>	<b>Carol Lin</b>
<b>Amy Herring</b>	<b>Todd Durham</b>	<b>Keith Muller</b>
<b>Tom Loughin</b>	<b>Kirk Easley</b>	<b>Soomin Park</b>
<b>Jared Lunceford</b>	<b>Abie Ekangaki</b>	<b>Shyamal</b>
<b>Paddada</b>		
<b>Jeffrey Morris</b>	<b>Deborah Ingram</b>	<b>Jose Pinheiro</b>
<b>Kerrie Nelson</b>	<b>Xuejen Peng</b>	<b>Paul Rathouz</b>
<b>Frank Roesch</b>	<b>James Rosenberger</b>	<b>Jeremy Taylor</b>
<b>Helen Zhang</b>	<b>Maura Stokes</b>	<b>Melanie Taylor</b>

## Programs

2006 Joint Statistical Meetings  
**Brent Coull**

2007 Joint Statistical Meetings  
**Christopher S. Coffey**



2006 Spring Meeting – Tampa, Florida  
Program Chair: **Montserrat Fuentes**  
Program Cochair: **Jose Pinheiro**

2007 Spring Meeting – Atlanta, Georgia  
Program Chair: **Amy Herring**  
Program Cochair: **Gene Pennello**

*Biometrics* Editors  
**Marie Davidian, Laurence Freedman, Mike Kenward, Naisyin Wang**

*Biometric Bulletin* Editor  
**Urania Dafni**

ENAR Correspondent for the *Biometric Bulletin*  
**Rosalyn Stone**

ENAR Executive Director  
**Kathy Hoskins**

International Biometric Society Business Manager  
**Claire Shanley**

Committee of Presidents of Statistical Societies (COPSS) ENAR Representatives  
**Jane Pendergast (President), Peter Imrey (Past-President), Lisa LaVange (President-Elect)**

ENAR Standing/Continuing Committee Chairs  
Nominating **Marie Davidian**  
Sponsorship **B. Christine Clark**

Information Technology Oversight Committee (ITOC)  
**Bonnie LaFleur**

American Association for the Advancement of Science (Joint with WNAAR) Terms through February 22, 2006

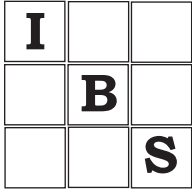
Section N, Medical Sciences	<b>Joan Hilton</b>
Section G, Biological Sciences	<b>Geof Givens</b>
Section U, Statistics	<b>Mary Foulkes</b>
Section O, Agriculture	<b>Kenneth Porter</b>
Section E, Geology and Geography	<b>Stephen Rathbun</b>

National Institute of Statistical Sciences (ENAR President is also an ex-officio member) Board of Trustees Member: **Lisa LaVange**

## Business Office

Eastern North American Region  
International Biometric Society  
12100 Sunset Hills Road, Suite 130  
Reston, VA 20190  
Phone: (703) 437-4377  
Fax: (703) 435-4390  
Email: [enar@enar.org](mailto:enar@enar.org)  
Web: [www.enar.org](http://www.enar.org)

## International Biometric Society— Western North American Region



President  
**Christine McLaren**

President-Elect  
**Ken Burnham**

Past President  
**Chris Drake**

Secretary  
**Antje Hoering**

Treasurer  
**Kenneth Kopecky**

Program Coordinator  
**Weng Kee Wong**

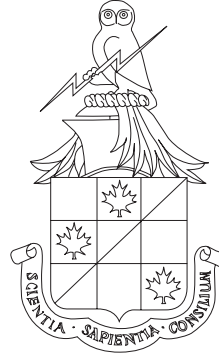
Representatives at-Large  
2006–2008: **Jennifer Hoeting, Rhonda Rosychuk**  
2005–2007: **Todd Alonzo, Barbra Richardson**  
2004–2006: **Ken Burnham, Sandrine Dudoit**

IBS Council Representatives  
**John Neuhaus**  
**Elizabeth Thompson**

### **Business Office:**

WNAR Membership Services  
Cancer Research and Biostatistics  
1730 Minor Avenue, Suite 1900  
Seattle, WA 98101-1468  
Email: [wnar@crab.org](mailto:wnar@crab.org)  
Web: [www.wnar.org](http://www.wnar.org)

## Statistical Society of Canada- Executive 2006–2007



President  
**Charmaine Dean**

President-Elect  
**Christian Genest**

Past President  
**David Binder**

Secretary  
**Paul Cabilio**

Treasurer  
**Edward Chen**

Public Relations Officer  
**Angelo Canty**

### **Business Office:**

Statistical Society of Canada  
577 King Edward Avenue  
Ottawa, ON Canada K1N 6N5  
Phone: (613) 562-5320  
Fax: (613) 565-6774  
Email: [admin@ssc.ca](mailto:admin@ssc.ca)  
Web: [www.ssc.ca](http://www.ssc.ca)

# Institute of Mathematical Statistics



## Executive Committee

President

**Jim Pitman**

President-Elect

**Jianqing Fan**

Past President

**Thomas Kurtz**

Program Secretary

**Andrew Nobel**

Executive Secretary

**Cindy Christiansen**

Treasurer

**Jiayang Sun**

## Editors

Editor, *The Annals of Applied Probability*

**Ed Waymire**

Editor, *The Annals of Probability*

**Gregory F. Lawler**

Editors, *The Annals of Statistics*

**Morris L. Eaton**

**Jianqing Fan**

Executive Editor, *Statistical Science*

**Ed George**

Editor, *IMS Bulletin*

**Bernard Silverman**

Editor, *Lecture Notes-Monograph Series*

**Richard Vitale**

Editor, IMS Web Site

**Krzysztof Burdzy**

Managing Editor, *Statistics*

**Paul Shaman**

Managing Editor, *Probability*

**Michael Phelan**

Editor, *Electronic Journal of Probability*

**Andreas Greven**

Editor, *Electronic Communications in Probability*

**David Nualart**

Managing Editors, *Electronic Probability Journals*

**Philippe Carmona**

**Zhenqing Chen**

Editor, *Probability Surveys*

**David Aldous**

## Council

**Richard Gill** 2006

**Hans R. Kunsch** 2006

**Christian P. Robert** 2006

**Ruth J. Williams** 2006

**Thomas DiCiccio** 2006

**Susan Holmes** 2007

**Nancy Flournoy** 2007

**Erwin Bolthausen** 2007

**Michael Steele** 2007

**Xuming He** 2007

**Maury Bramson** 2008

**Merlise Clyde** 2008

**John H. J. Einmahl** 2008

**Jun Liu** 2008

**Daniel Peña** 2008

## Business Office

Elyse R. Gustafson, Executive Director

P.O. Box 22718

Beachwood, OH 44122

Phone: (216) 295-2340

Fax: (216) 295-5661

Email: [ims@imstat.org](mailto:ims@imstat.org)

Web: [www.imstat.org](http://www.imstat.org)

# Continuing Education *at a glance*

Time	Course	Instructor(s)	Course Title
<b>SATURDAY, AUGUST 5, 2006</b>			
8:30 a.m. – 5:00 p.m.	CE_01C	Gary G. Koch/Todd Schwartz/Rebekkah Dann	Categorical Data Analysis (two-day course)
8:30 a.m. – 5:00 p.m.	CE_02C	Partha Lahiri	Small Area Estimation
8:30 a.m. – 5:00 p.m.	CE_03C	Peter Guttorp/Paul Sampson	Modern Approaches to Nonstationary Models of Spatial and Space-Time Processes with Air Quality Applications
8:30 a.m. – 5:00 p.m.	CE_04C	Bruno Sanó	Bayesian Inference
8:30 a.m. – 5:00 p.m.	CE_05C	Richard De Veaux	Practical Data Mining
8:30 a.m. – 5:00 p.m.	CE_06C	Garrett Fitzmaurice	Applied Longitudinal Analysis
<b>SUNDAY, AUGUST 6, 2006</b>			
8:30 a.m. – 5:00 p.m.	CE_01C	Gary G. Koch/Todd Schwartz/Rebekkah Dann	Categorical Data Analysis (two-day course)
8:30 a.m. – 5:00 p.m.	CE_07C	David Madigan/David Lewis	Text Mining
8:30 a.m. – 5:00 p.m.	CE_08C	Roger Tourangeau	The Psychology of Survey Response
8:30 a.m. – 5:00 p.m.	CE_09C	Stefan Wellek	Statistical Methods for the Confirmatory Analysis of Equivalence/Noninferiority Studies
8:30 a.m. – 5:00 p.m.	CE_10C	Jennifer A. Hoeting/Geof H. Givens	Computational Statistics: Methods for Monte Carlo Integration and Optimization
8:30 a.m. – 5:00 p.m.	CE_11C	Frank E. Harrell, Jr.	Regression Modeling Strategies
8:30 a.m. – 5:00 p.m.	CE_12C	Bradley P. Carlin/Thomas A. Louis	Hierarchical Bayes Methods and Software for Data Analysis
8:30 a.m. – 5:00 p.m.	CE_13C	Oliver Schabenberger	Generalized Linear Mixed Models: Theory and Applications
<b>MONDAY, AUGUST 7, 2006</b>			
8:00 a.m. – noon	CE_14C	Anthony R. Olsen/Donald L. Stevens, Jr.	Spatial Survey Design with a Focus on Natural Resources
8:00 a.m. – noon	CE_15C	Danyu Lin	Analysis of Multivariate Failure Time Data
★ 8:30 a.m. – 5:00 p.m.	CE_16C	Peter H. Westfall	Multiple Comparisons and Multiple Tests
8:30 a.m. – 5:00 p.m.	CE_17C	Bruce D. Spencer/Juha M. Alho	Statistical Demography with Applications
★ 8:30 a.m. – 5:00 p.m.	CE_18C	Christy Chuang-Stein/Alex Dmitrienko/Geert Molenberghs	Analysis of Clinical Trials: Theory and Applications
8:30 a.m. – 5:00 p.m.	CE_19C	Alan Gelfand/Athanasios Kottas	Applied Bayesian Nonparametric Modeling
8:30 a.m. – 5:00 p.m.	CE_20C	Sophia Rabe-Hesketh/Anders Skrondal	Generalized Linear and Latent Mixed Models
1:00 p.m. – 5:00 p.m.	CE_21C	Naomi B. Robbins	Creating More Effective Graphs
<b>TUESDAY, AUGUST 8, 2006</b>			
8:00 a.m. – noon	CE_23C	Thomas W. O’Gorman	Adaptive Tests of Significance and Confidence Intervals
8:30 a.m. – 5:00 p.m.	CE_24C	Malay Ghosh/Bhramar Mukherjee/Samiran Sinha	Bayesian Analysis of Case-Control Data
8:30 a.m. – 5:00 p.m.	CE_25C	Dennis R. Helsel/Lopaka Lee	Analysis of Environmental Data with Nondetects
8:30 a.m. – 5:00 p.m.	CE_26C	Geert Verbeke/Geert Molenberghs	Models for Discrete Repeated Measures
8:30 a.m. – 5:00 p.m.	CE_27C	Judith A. Swan	Effective Scientific Writing
8:30 a.m. – 5:00 p.m.	CE_28C	Scott D. Patterson/Byron Jones	Bioequivalence and Statistics in Clinical Pharmacology
8:30 a.m. – 5:00 p.m.	CE_29C	Geoff McLachlan/Kim-Anh Do	Methods and Computational Tools for the Screening and Classification of Microarray Gene Expression Data
1:00 p.m. – 5:00 p.m.	CE_30C	Ingram Olkin	Meta-analysis: Statistical Methods for Combining the Results of Independent Studies

★—Excellence-in-CE Award



# WEDNESDAY, August 9

**FEE: \$50 each**  
**Computer Technology Workshops**



## Computer Technology Workshops *at a glance*

Time	Course	Instructor(s)	Title
8:30 a.m. – 10:15 a.m.	CE_31T	Dongping Fang	Time Series in SPSS: Automatic Model Selection and Outlier Detection
8:30 a.m. – 10:15 a.m.	CE_32T	Michael Borenstein/Hannah R. Rothstein	Meta-analysis: Concepts and Applications
8:30 a.m. – 10:15 a.m.	CE_33T	John Castelloe	Power and Sample Size Analysis Using SAS/STAT Software
10:30 a.m. – 12:15 p.m.	CE_34T	Mikhail Golovnya	Introduction to CART: Data Mining with Decision Trees
10:30 a.m. – 12:15 p.m.	CE_35T	Michael Borenstein	Power Analysis: A Simple and Effective Approach
10:30 a.m. – 12:15 p.m.	CE_36T	Robert Cohen	Modern Regression Analysis in SAS Software
2:00 p.m. – 3:45 p.m.	CE_37T	Mikhail Golovnya	Advances in Data Mining: Jerome Friedman's TreeNet/MART and Leo Breiman's Random Forests
2:00 p.m. – 3:45 p.m.	CE_38T	Cyrus Mehta	East 4: A Comprehensive Package for Adaptive and Group Sequential Design, Interim Monitoring, and Simulation
2:00 p.m. – 3:45 p.m.	CE_39T	Colin (Lin) Chen	Quantile Regression Using the SAS QUANTREG Procedure
4:00 p.m. – 5:45 p.m.	CE_40T	Mikhail Golovnya	Introduction to MARS: Predictive Modeling with Nonlinear Automated Regression Tools
4:00 p.m. – 5:45 p.m.	CE_41T	Shawn Harahush	From Software to Solutions in Statistics and Risk Analysis



# Seeking a CAREER in STATISTICS?

Seattle, WA  
August 6–10



Are you nearing graduation and wondering about entry-level jobs?  
Are you an experienced statistics professional interested in career information?

## Register for the JSM Career Placement Service!

### *What can the CAREER PLACEMENT SERVICE do for YOU?*

Each year, hundreds of companies, universities, recruiters, and government agencies search for applicants using the JSM Career Placement Service. At the 2005 JSM in Minneapolis, employers listed more than 200 positions for qualified statisticians. The JSM Career Placement Service provided the best opportunity for qualified applicants to meet employers, establish valuable contacts, and learn about organizations employing statisticians.

### *Career Placement Service BENEFITS*

**APPLICANT READING AREA**—for applicants to review complete job descriptions and contact information for all registered employers.

**VISIBILITY TO EMPLOYERS**—applicants who register by July 20, 2006, will have their forms and résumés included in the Advance Applicant access database, available to employers prior to the meeting. Employers often contact applicants whose forms are included in the database prior to JSM to schedule interviews.

**COMPUTERIZED MESSAGE CENTER**—allows applicants and employers to communicate throughout the meeting.

***[www.amstat.org/meetings/jsm/2006/placement](http://www.amstat.org/meetings/jsm/2006/placement)***

#### Organizations Represented at Recent JSM Career Placement Services

Capital One • FDA • Genentech • PPD • Stanford University  
GE Consumer Finance • Pacific Northwest National Lab • Eli Lilly

**The JSM Career Placement Service** offers a full-service recruiting facility, including online registration, private interview booths, and an onsite computerized message center. Each year, hundreds of qualified applicants look to the JSM Career Placement Service to begin or further their careers in statistics. If you are an employer with statistical job openings or a statistician looking for a first or new job, the JSM Career Placement Service is here to help. Please see Page 19 for hours of operation.

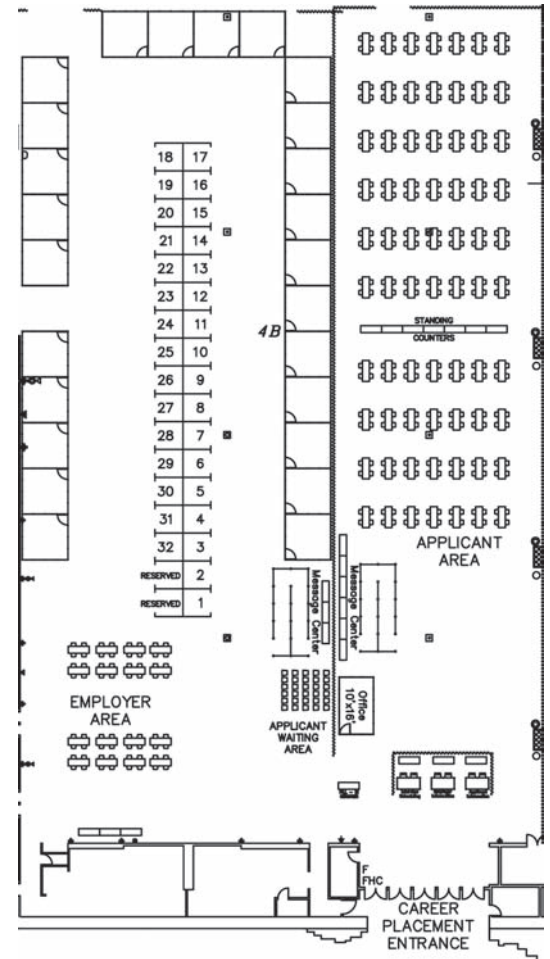
## JSM 2006 Registered Employers\*

### Executive Suite Employers

Abbott Vascular	Mayo Clinic
Amgen Inc.	Merck Research Laboratories
Battelle	National Institute of Standards and Technology
Bristol-Myers Squibb	National Opinion Research Center
Capital One	National Security Agency
Eli Lilly and Company	Novartis Pharmaceuticals, Inc.
Food and Drug Administration, CDRH	PPD, Inc.
GE Consumer Finance	sanofi-aventis
GlaxoSmithKline	SAS Institute, Inc.
Google	University of Florida, College of Medicine
John Deere Credit	

### Registered Employers

Axio Research Acquisition Co., LLC.	Smith Hanley Consulting Group
Baruch College, City University of New York	Takeda Global Research and Development Center, Inc.
Bureau of Labor Statistics	TAP Pharmaceuticals
Clemson University	Texas Tech University
CSU Fullerton	The Boeing Company
DuPont Engineering Technology	The Cambridge Group, Ltd.
GE Global Research	The EMMES Corporation
Internal Revenue Service	The University of Texas Health Science Center
Johnson & Johnson Family of Companies	U.S. Census Bureau
Kennesaw State University	University of Alberta, School of Business
Lawrence Livermore National Laboratory	University of Denver, Daniels College of Business
LSU School of Public Health	University of South Florida
Medical Technology and Practice Patterns Institute	Virginia Commonwealth University
Northwestern University	W.L. Gore & Associates
Organon	Washington University, School of Medicine
Pfizer Global Research and Development	Westat
SciMetrika, LLC	
Smith Hanley Associates	



**Washington State Convention  
& Trade Center Exhibit**  
Hall 4B

\*This list represents employers who registered by the Early Bird deadline of June 29, 2006. Additional employers will be participating onsite.

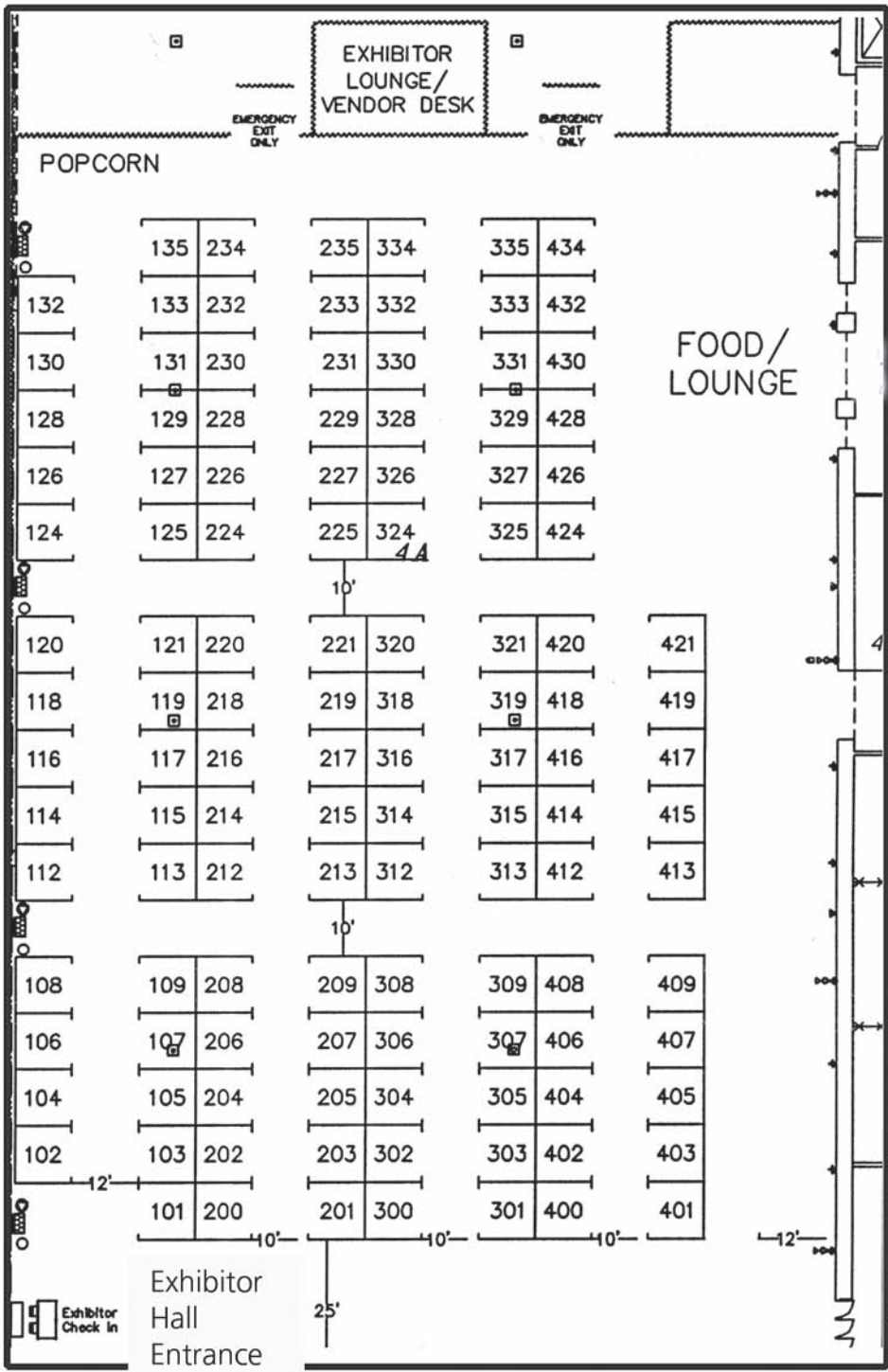
# Listing of Exhibitors by Booth Number

---

<b>Booth Number</b>	<b>Exhibitor Name</b>
<b>101, 103, 105, 107</b>	American Statistical Association
<b>102</b>	Institute of Mathematical Statistics
<b>104</b>	Statistical Society of Canada
<b>106</b>	SIAM—Society for Industrial & Applied Mathematics
<b>108</b>	ASA-SIAM Series
<b>109</b>	JSM 2007 Salt Lake City
<b>112, 114</b>	Minitab Inc.
<b>113, 115, 117, 119</b>	Springer
<b>116, 118</b>	Salford Systems
<b>120</b>	Bureau of Economic Analysis
<b>121</b>	MacKichan Software
<b>124</b>	National Center for Health Statistics
<b>125</b>	Centers for Disease Control and Prevention
<b>126</b>	Bureau of Labor Statistics
<b>127</b>	Internal Revenue Service (IRS), Statistics of Income Division
<b>128, 130</b>	U.S. Census Bureau
<b>129</b>	U.S. Department of Education
<b>131, 133</b>	National Security Agency
<b>132</b>	U.S. Department of Agriculture, National Agricultural Statistics Service
<b>135</b>	National Death Index, NCHS, CDC
<b>200, 202</b>	JMP
<b>201, 203, 205</b>	SAS Application
<b>204, 206, 208</b>	SAS Publishing
<b>207, 209</b>	SAS Education
<b>212, 214</b>	Cytel Inc.
<b>213</b>	NCSS
<b>215, 217</b>	Duxbury
<b>216</b>	statistics.com
<b>218, 220</b>	Cambridge University Press
<b>219</b>	Hawkes Learning Systems
<b>221</b>	Blackwell Publishing
<b>224</b>	Placemart Personnel Service
<b>225</b>	The Cambridge Group Ltd.
<b>233, 235</b>	Aptech Systems, Inc.
<b>300</b>	W.H. Freeman and Company

<b>Booth Number</b>	<b>Exhibitor Name</b>
<b>301, 303</b>	Statpoint Inc.
<b>302</b>	Visual Numerics, Inc.
<b>304</b>	Capital One
<b>305</b>	Eli Lilly and Company
<b>306, 308</b>	Prentice Hall
<b>307</b>	GE Money - Global Decision Sciences
<b>309, 408</b>	Insightful Corporation
<b>312</b>	SAGE Publications
<b>313, 315</b>	RTI International
<b>314</b>	MedFocus LLC
<b>316</b>	Allergan, Inc.
<b>317, 319, 321, 416, 418, 420</b>	CRC Press - Taylor & Francis Group LLC
<b>318</b>	Stat-Ease, Inc.
<b>320</b>	Smith Hanley
<b>324</b>	Amgen Inc.
<b>325</b>	Systat Software, Inc.
<b>326</b>	ASG, Inc.
<b>327</b>	McGraw-Hill Higher Education
<b>329</b>	Organon, USA
<b>331</b>	Pfizer Global Research and Development
<b>400, 402</b>	Oxford University Press
<b>401, 403</b>	StatSoft, Inc.
<b>404</b>	Mayo Clinical Trial Services
<b>405</b>	Kforce Clinical Research Staffing
<b>406</b>	Amazon.com
<b>407, 409</b>	ELSEVIER
<b>412</b>	Addison-Wesley
<b>413</b>	Palisade Corporation
<b>415, 417</b>	Scientific Computing Associates, Inc. (SCAI)
<b>419</b>	Biostat, Inc.
<b>421</b>	COMSYS
<b>424, 426, 428, 430</b>	Wiley
<b>432, 434</b>	SPSS, Inc.

# EXPO 2006 Floor Plan



Washington State Convention & Trade Center—Exhibit Hall 4A

# Listing of Exhibitors by Name

Exhibitor Name	Booth Number
ASA-SIAM Series	108
ASG, Inc.	326
Addison-Wesley	412
Allergan, Inc.	316
Amazon.com	406
American Statistical Association	101, 103, 105, 107
Amgen Inc.	324
Aptech Systems, Inc.	233, 235
Biostat, Inc.	419
Blackwell Publishing	221
Bureau of Economic Analysis	120
Bureau of Labor Statistics	126
COMSYS	421
CRC Press - Taylor & Francis Group LLC	321, 319, 317, 416, 418, 420
Cambridge University Press	218, 220
Capital One	304
Centers for Disease Control and Prevention	125
Cytel Inc.	212, 214
Duxbury	215, 217
Eli Lilly and Company	305
ELSEVIER	407, 409
GE Money - Global Decision Sciences	307
Hawkes Learning Systems	219
Insightful Corporation	309, 408
Institute of Mathematical Statistics	102
Internal Revenue Service (IRS), Statistics of Income Division	127
JMP	200, 202
JSM 2007 Salt Lake City	109
Kforce Clinical Research Staffing	405
MacKichan Software	121
Mayo Clinical Trial Services	404
McGraw-Hill Higher Education	327
MedFocus LLC	314
Minitab Inc.	112, 114
NCSS	213

Exhibitor Name	Booth Number
National Center for Health Statistics (NCHS)	124
National Death Index, NCHS, CDC	135
National Security Agency	131, 133
Organon USA	329
Oxford University Press	400, 402
Palisade Corporation	413
Pfizer Global Research and Development	331
Placemart Personnel Service	224
Prentice Hall	306, 308
RTI International	313, 315
SAGE Publications	312
Salford Systems	116, 118
SAS Application	201, 203, 205
SAS Education	207, 209
SAS Publishing	204, 206, 208
Scientific Computing Associates, Inc. (SCAI)	415, 417
SIAM-Society for Industrial & Applied Mathematics	106
Smith Hanley	320
Springer	113, 115, 117, 119
SPSS, Inc.	432, 434
Stat-Ease, Inc.	318
Statistical Society of Canada	104
statistics.com	216
Statpoint Inc.	301, 303
StatSoft, Inc.	401, 403
Systat Software, Inc.	325
The Cambridge Group Ltd	225
U.S. Census Bureau	128, 130
U.S. Department of Agriculture, National Agricultural Statistics Service	132
U.S. Department of Education	129
Visual Numerics, Inc.	302
W.H. Freeman & Company	300
Wiley	424, 426, 428, 430



# Who's Who in the Exhibit Hall

▲—Pinnacle Partner ◆—Diamond Partner ★—Gold Partner ○—Silver Partner

## ASA-SIAM Series 108

Alexandria, Virginia

The ASA-SIAM Series on Statistics and Applied Probability is published jointly by the ASA and the Society for Industrial and Applied Mathematics. The series consists of a spectrum of books on topics in statistics and applied probability and provides inexpensive, quality publications of interest to the intersecting membership of the two societies.

## ASG, Inc. 326

Vernon Hills, Illinois

ASG, Inc., is a growing national staffing and functional outsourcing company dedicated to providing experienced professionals to staff positions in clinical research; SAS programming; data management; regulatory affairs; and statistical analysis for customers capturing, analyzing, and producing data in the pharmaceutical, biotech, health care, and financial industries.

## Addison-Wesley 412

Upper Saddle River, New Jersey

Stop by, meet our authors, and explore a full display of our statistics titles, including DeVeaux/Velleman/Bock's *Intro Stats (2nd edition)* and *Triola Elementary Statistics (10th edition)* and new texts in biostatistics, probability, and time series. And try out our new and exciting technology, including MyStatLab and ActivStats!

## Allergan, Inc. 316

Irvine, California

Allergan is a global specialty pharmaceutical company that develops and commercializes innovative products for eye care, neuromodulator, skin care, and other specialty markets.

## Amazon.com 406

Seattle, Washington

Amazon.com Risk Analytics team is at the forefront of risk management at Amazon. The activities of Risk Analytics have a direct impact on Amazon's business through the use of statistical modeling and analysis and data mining to detect and eliminate the ever-increasing risks in the e-commerce marketplace.

## American Statistical Association 101, 103, 105, 107

Alexandria, Virginia

Since 1839, the ASA has been the world's leading professional association for statisticians. The ASA serves as a forum for sharing ideas, experiences, innovations, and accomplishments. Members are involved in many areas of statistics, including medicine, computer applications, quality management, analytical research, setting standards for statistics, and promoting statistical education.

## ○ Amgen Inc. 324

Thousand Oaks, California,

Amgen (NASDAQ: AMGN)—a biotechnology pioneer—discovers, develops, and delivers innovative human therapeutics. Our medicines have helped millions of patients in the fight against cancer, kidney disease, rheumatoid arthritis, and other serious illnesses. With a deep and broad pipeline of potential new medicines, we continue to advance science to serve patients.

## Aptech Systems, Inc. 233, 235

Maple Valley, Washington

The GAUSS Mathematical and Statistical System is a fast matrix programming language used widely for solving mathematical and statistical problems. GAUSS is designed for computationally intensive tasks and suits the researcher who lacks time to develop programs in C or FORTRAN, but finds statistical or mathematical packages inflexible.

## Biostat, Inc. 419

Englewood, New Jersey

Comprehensive Meta-Analysis is the world's best-selling program for meta-analysis. Sign up for our workshop or visit our booth for a free trial CD—[www.meta-analysis.com](http://www.meta-analysis.com).

## Blackwell Publishing 221

Malden, Massachusetts

Blackwell Publishing is a leading international publisher in all areas of statistics, science, technology, and medicine. Please stop by our booth for complimentary copies of our journals. You also may visit our web site at [www.blackwellpublishing.com](http://www.blackwellpublishing.com) for information about all our publications.

## Bureau of Economic Analysis 120

Baltimore, Maryland

The BEA promotes a better understanding of the U.S. economy by providing the most timely, relevant, and accurate economic accounts data in an objective and cost-effective way.

## Bureau of Labor Statistics 126

Washington, DC

As the principal fact-finding agency for the federal government in the broad field of labor economics and statistics, the BLS provides useful data that pertain to your community. For example, BLS tracks employment, work-related injuries, illnesses and fatalities, the Consumer Price Index, and wages by area and occupational title. We encourage you to visit our booth and ask for our five-minute demonstration on how to access online current and historical BLS data from the database. Our web site is [www.bls.gov](http://www.bls.gov).



- COMSYS** 421  
Portage, Michigan  
COMSYS is the leading provider of SAS statistics and clinical services to companies nationwide. We enable statisticians and programmers to support their customers more efficiently through innovative analytical applications and overflow support. COMSYS is a SAS Alliance Gold Partner, with more than 40 offices in the United States and Canada.
- CRC Press - Taylor & Francis Group LLC** 317, 319, 321, 416, 418, 420  
Boca Raton, Florida  
Chapman & Hall/CRC (now a part of The 20) Taylor & Francis Group LLC is a premier publisher of books and journals on statistics. Please visit our booth to pick up a journal sample copy and browse through our books that include specials at a 50% discount and all other titles at up to a 25% discount.
- **Cambridge University Press** 218, 220  
New York, New York  
Cambridge's new titles in statistics, biostatistics, econometrics, mathematical finance, and more are available at a 20% discount. New books in the Cambridge Series in Statistical and Probabilistic Mathematics include *Statistical Mechanics of Disordered Systems* by Anton Bovier and *The Coordinate-Free Approach to Linear Models* by Michael J. Wichura.
- ◆ **Capital One** 304  
Richmond, Virginia  
Capital One is a Fortune 500 company providing access to credit to tens of millions worldwide. We also provide auto, home, and business loans, plus banking and other services. Statistical expertise is central to our success. Capital One seeks superior applied statisticians at all career stages.
- Centers for Disease Control and Prevention** 125  
Atlanta, Georgia  
The Centers for Disease Control and Prevention is one of the 13 major operating components of the Department of Health and Human Services, which is the principal agency in the United States government for protecting the health and safety of all Americans and for providing essential human services.
- **Cytel Inc.** 212, 214  
Cambridge, Massachusetts  
Cytel Inc. provides innovative clinical trial design services and specialized statistical applications. Cytel's East® is used throughout industry, academia, and the FDA for designing, simulating, and monitoring clinical trials. Cytel develops superior tools and services that increase problemsolving efficiencies and reduce development costs.
- Duxbury** 215, 217  
Belmont, California  
Visit Duxbury-Thomson Publishers at booths 215 and 217. View our latest publications and technology innovations. With more than 30 years of experience publishing in the field of statistics, Duxbury is the source for complete solutions for all teaching needs, from introductory to advanced statistics courses. Duxbury: a Tradition of Quality and Innovation...
- ★ **Eli Lilly and Company** 305  
Indianapolis, Indiana  
Eli Lilly and Company is a leading, innovation-driven corporation committed to developing a growing portfolio of best-in-class and first-in-class pharmaceutical products that help people live longer, healthier, and more active lives.
- ELSEVIER** 407, 409  
New York, New York  
Elsevier/Academic Press is a worldwide leader in scientific and technical publishing. Come see our latest titles, including Roussas' *An Introduction to Probability*, Ross' *Introduction to Probability Models (9th edition)*, and Freund/Wilson's *Regression Analysis (2nd edition)*. Pick up instructor copies at up to 30% off in addition to sample journals, including *Statistical Methodology*. Visit <http://books.elsevier.com/apmath>.
- GE Money - Global Decision Sciences** 307  
Stamford, Connecticut  
GE Money is a leading provider of credit services to consumers, retailers, and auto dealers in 50 countries. With more than 300,000 employees across 160 countries and the power of \$163 billion in assets, we offer flexible working arrangements, a diverse environment, world-class leadership, comprehensive training, and "Fast Track Leadership Programs."
- Hawkes Learning Systems** 219  
Charleston, South Carolina  
For 20 years, Hawkes Learning Systems has specialized in math courseware. Our courseware is based on mastery-level learning and offers unlimited practice problems, tutorials, and intelligent feedback. On its own or as a supplement, our courseware improves student performance and provides instructors with an online grade book and state-of-the-art test generator.
- Insightful Corporation** 309, 408  
Seattle, Washington  
Insightful Corporation (NASDAQ:IFUL) is a provider of predictive analytics and reporting solutions. Insightful products S-PLUS®, Insightful Miner®, S-PLUS® Server, and InFact® provide companies with the knowledge to act. Insightful consulting services provide specialized expertise and proven processes for the design, development, and deployment of customized solutions.

- Institute of Mathematical Statistics** 102  
Beachwood, Ohio  
The Institute of Mathematical Statistics is an international professional society devoted to the development and dissemination of the theory and applications of statistics and probability. Its activities include sponsorship of journals and other scientific publications and organization of scientific meetings.
- Internal Revenue Service (IRS),  
Statistics of Income Division** 127  
Washington, DC  
The Statistics of Income (SOI) Division produces data compiled from tax and information returns filed with the IRS. SOI data about the financial composition of individuals, business taxpayers, tax-exempt organizations, and more are available through publications, electronic databases, Tax Stats ([www.irs.gov/taxstats](http://www.irs.gov/taxstats)), and SOI's Statistical Information Services office, (202) 874-0410.
- JMP** 200, 202  
Cary, North Carolina  
Point. Click. Discover. With JMP(r)6, the most recent release of statistical discovery software from SAS, it's that simple to innovate new products, processes, and services—with fewer R&D bottlenecks and reduced time to market. Check us out.
- JSM 2007 Salt Lake City** 109  
Salt Lake City, Utah  
Salt Lake City, host of JSM 2007, welcomes you. Please stop by Booth 109 for visitor information and answers to your questions.
- Kforce Clinical Research Staffing** 405  
Tampa, Florida  
Kforce provides outsourcing alternatives and traditional staffing services for the bio-pharma industries, including monitoring, clinical trial management, project management, drug safety, data management, SAS programming, biostats, and data entry.
- MacKichan Software** 121  
Poulsbo, Washington  
New! Scientific WorkPlace 5.5 simplifies writing, sharing, and doing mathematics. The click of a button allows you to typeset in LaTeX. The integrated computer algebra system lets you solve and plot equations; animate 2D and 3D plots; rotate, move, and fly through 3D plots; create 3D implicit plots; and more.
- **Mayo Clinical Trial Services** 404  
Rochester, Minnesota  
Mayo Clinical Trial Services, a full-service Academic Research Organization (ARO), offers capabilities a CRO cannot match due to Mayo Clinic's medical expertise and academic leadership.
- McGraw-Hill Higher Education** 327  
New York, New York  
McGraw-Hill is the leading provider of textbooks and technology applications in higher education and publishes introductory and advanced titles in general statistics and statistics for business and economics, engineering, and social sciences. ALEKS, Homework Manager Plus, Visual Statistics, and MathZone are a few of the technology applications available from McGrawHill.
- MedFocus LLC** 314  
Des Plaines, Illinois  
MedFocus offers clinical and scientific research contract outsourcing and staffing to the pharmaceutical, biotechnology, and medical device industries specifically. MedFocus has achieved premier status as a top source of hiring for clinical research.
- **Minitab Inc.** 112, 114  
State College, Pennsylvania  
Minitab®, the leading statistical software package in education, is used around the world by instructors at more than 4,000 colleges, universities, and high schools. Minitab Statistical Software contains all the statistical methods students need and is powerful, reliable, and easy-to-use. For affordable student rental and purchase options, visit e-academy's Minitab Center at [www.e-academy.com/minitab](http://www.e-academy.com/minitab). For more information, visit [www.minitab.com/education](http://www.minitab.com/education).
- NCSS** 213  
Kaysville, Utah  
NCSS announces the availability of GESS, a new program for the statistical analysis of microarray data. Stop by our booth for a demonstration. We will also demonstrate PASS, our sample size program, and NCSS, our data analysis program.
- National Center for Health Statistics** 124  
Hyattsville, Maryland  
The NCHS exhibit will showcase the various NCHS programmatic areas with an emphasis on statistical research and methodology. The exhibit will allow attendees to view and acquire a host of publications, electronic products, and other promotional products.
- National Death Index, NCHS, CDC** 135  
Hyattsville, Maryland  
The National Death Index assists researchers in determining whether subjects have died and provides the states and dates of death, death certificate numbers, and cause of death.

○ **National Security Agency** 131, 133

Fort Meade, Maryland

The Information Assurance mission provides the solutions, products, and services—and conducts defensive information operations—to achieve information assurance for information infrastructures critical to U.S. national security interests. The foreign signals intelligence, or SIGINT, mission allows for an effective, unified organization and control of all the foreign signals collection and processing activities of the United States.

○ **Organon, USA** 429

Roseland, New Jersey

Organon is a global leader in the creation of innovative prescription medicines for women's health, mental health, and anesthesia—products that contribute to the health of people and their quality of life. Organon offers challenging work assignments with a chance to grow and learn on professional and personal levels within a global organization.

○ **Oxford University Press** 400, 402

New York, New York

Oxford University Press is the oldest publisher in the English language and known throughout the world for the quality of their publications. A department of Oxford University, OUP publishes more than 4,000 titles and 150 journals a year. Stop by our booth and save 20% on all titles on display.

○ **Palisade Corporation** 413

Ithaca, New York

Palisade Corporation has been a leading provider of risk analysis, decision analysis, optimization, and data analysis software since 1984. Recently, Palisade released NeuralTools, a neural networks add-in for Microsoft Excel, and StatTools, a statistical analysis add-in for Microsoft Excel that replaces Excel's statistics functions with a robust and accurate set of statistical analysis procedures and routines.

○ **Pfizer Global Research and Development** 331

New York, New York

Pfizer Global Research and Development's discovery and development division is one of the finest pharmaceutical research institutions in the world. Pfizer discovers and delivers medicines to enhance the health of people and animals. Our search for new treatments spans research projects across multiple therapeutics areas—more than any other company.

○ **Placemart Personnel Service** 224

Lanoka Harbor, New Jersey

Placemart Personnel Service specializes in executive search services in clinical drug and medical product R&D. For more than 40 years, we have been matching jobs and job candidates in biostatistics. Typical positions include directors, managers, project managers, group leaders, biostatisticians, data analysts, and statistical programmers. For details, visit [www.placemart.com](http://www.placemart.com).

○ **Prentice Hall** 306, 308

Upper Saddle River, New Jersey

Prentice Hall will display statistics textbooks ranging from the introductory level, such as Agresti/Franklin's *Statistics (preliminary edition)* and McClave/ Sincich's *Statistics (10th edition)* to more advanced and specialized course texts, such as Epstein's *Medical Image Processing* and Hogg/Tanis' *Probability and Statistical Inference (7th edition)*.

○ **RTI International** 313, 315

Research Triangle Park, North Carolina

For more than 45 years, RTI statisticians have developed and applied scientifically accepted statistical methodologies to address major national and global public policy issues. One tool RTI has developed is the internationally recognized SUDAAN Statistical Software package, which provides various procedures for analyzing survey and other cluster-correlated data.

○ **SAGE Publications** 312

Thousand Oaks, California

SAGE Publications—an independent international publisher in the social sciences, technology, and medicine—provides journals, books, and electronic media of the highest caliber. Researchers, students, and professionals have relied on our innovative resources for more than 40 years. Please stop by our booth or visit us at [www.sagepub.com](http://www.sagepub.com).

○ **Salford Systems** 116, 118

San Diego, California

Salford Systems develops advanced statistical and data mining software, including the CART® decision tree, MARS® automated regression, TreeNet® boosted decision trees and Random Forests®. Salford Systems strives to make the best academic research easily usable by the practicing data analyst and has won several distinguished international honors recently.

▲ **SAS Application** 201, 203, 205

Cary, North Carolina

SAS will exhibit its software for statistics, data mining, econometrics, and statistical quality control. Visit the SAS booth to talk with members of the development staff and learn about current offerings and upcoming software.

▲ **SAS Education** 207, 209

Cary, North Carolina

SAS' Higher Education Consulting Group provides universities and community colleges with programs and services that can help them incorporate SAS technology into their curriculums. The SAS Certified Professional program helps SAS users validate their knowledge of SAS software with globally recognized credentials. Visit both SAS-sponsored programs at booths 207 and 209.

▲ **SAS Publishing** 204, 206, 208  
Cary, North Carolina

Visit booths 204, 206, and 208 to learn more about saving 20% on orders placed or mailed to us by September 11, new SAS product documentation titles, new SAS Press titles, and SAS® Learning Edition 2.0, SAS® Self-Paced e-Learning. SAS Publishing staff are available to answer any questions and to assist you with your orders. Enjoy the conference!

**Scientific Computing Associates, Inc. (SCAI)** 415, 417  
New Haven, Connecticut

Scientific Computing Associates, Inc. (SCAI) is a leading provider of software and support for open-source and proprietary scripting languages, including R. The R Professional system from SCAI combines high-level scripting (for increased productivity) with high-performance computing to meet dramatically increasing computational demands. R Professional from SCAI provides full commercial support and independent certification.

**SIAM—Society for Industrial & Applied Mathematics** 106  
Philadelphia, Pennsylvania

Visit the SIAM booth to check out titles in the mathematics—ASA-SIAM Series on Statistics and Applied Probability. Browse recently published books and information. See sample issues of SIAM's renowned journals; membership applications will be available. Don't forget to pick up a copy of SIAM News for the road. [www.siam.org](http://www.siam.org).

**Smith Hanley** 320  
New York, New York

Our two divisions, permanent placement and contract staffing, offer targeted recruitment in statistics, biostatistics, SAS programming, data management, market research health outcomes, and epidemiology. Since 1980, we've provided clients and recruits dedicated service, experience, and insight into industry trends for positions at all levels. Visit [www.smithhanley.com](http://www.smithhanley.com) or [www.smithhanley-consulting.com](http://www.smithhanley-consulting.com).

○ **Springer** 113, 115, 117, 119  
New York, New York

Springer is one of the most renowned scientific publishing companies in the world. Its publications cover subjects ranging from the natural sciences, mathematics, engineering, and computer science to medicine, humanities, economics, and law. Springer publishes more than 3,400 new books each year and 1,250 journals, most of which are also available in electronic form.

▲ **SPSS, Inc.** 432, 434  
Chicago, Illinois

SPSS is the world's leading provider of predictive analytics software and solutions. Since 1968, SPSS has enabled its customers to improve their performance. Our software helps organizations optimize interactions with their customers and ensure that the actions they are taking today will positively affect their ability to reach tomorrow's goals.

**Stat-Ease, Inc.** 318  
Minneapolis, Minnesota

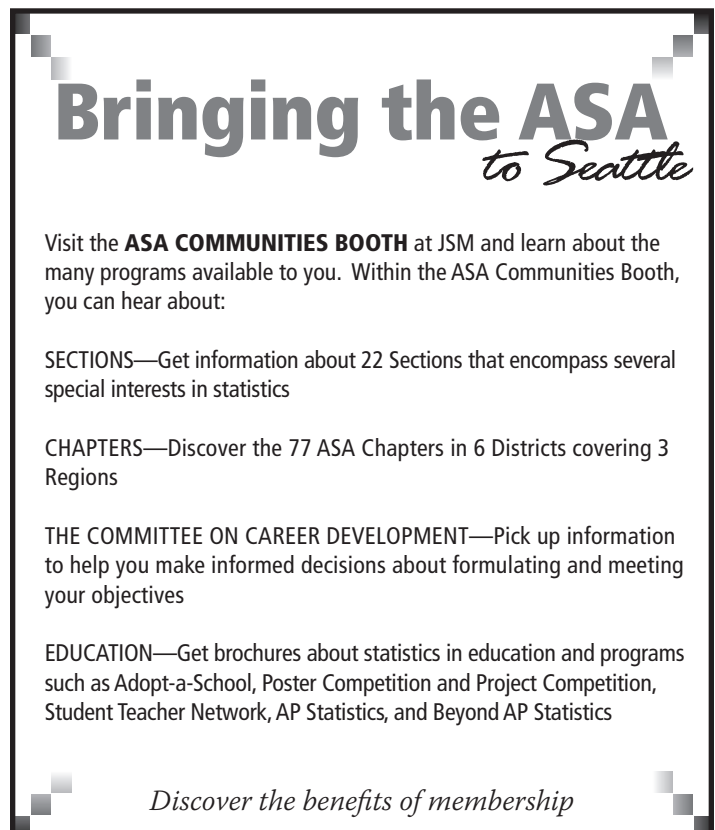
Stat-Ease, Inc. produces two easy-to-use Windows programs for design of experiments (DOE), including Design-Ease® 7.0 (new!) software for finding breakthrough factors and Design-Expert® 7.0 (new!) software for optimization. The company also offers computer-intensive DOE workshops, including Experiment Design Made Easy, Response Surface Methods for Process Optimization, and Mixture Design for Optimal Formulations.

**Statistical Society of Canada** 104  
Ottawa, Ontario

The Statistical Society of Canada's mission is to encourage the development and use of statistics and probability in Canada. It is the Canadian equivalent of the American Statistical Association. The Statistical Society of Canada also offers two levels of accreditation, the Professional Statistician (P.Stat.) and the Associate Statistician.

**statistics.com** 216  
Arlington, Virginia

XLMiner is a comprehensive data mining add-in for Excel. It offers neural nets, classification and regression trees, naive Bayes, k-nearest neighbors, logistic and linear regression, discriminant analysis, association rules, principal components, k-means and hierarchical clustering, partitioning, over-sampling, missing data handling, and sampling from and scoring to databases. Visit [www.xlminer.com](http://www.xlminer.com).



**Bringing the ASA**  
*to Seattle*

Visit the **ASA COMMUNITIES BOOTH** at JSM and learn about the many programs available to you. Within the ASA Communities Booth, you can hear about:

**SECTIONS**—Get information about 22 Sections that encompass several special interests in statistics

**CHAPTERS**—Discover the 77 ASA Chapters in 6 Districts covering 3 Regions

**THE COMMITTEE ON CAREER DEVELOPMENT**—Pick up information to help you make informed decisions about formulating and meeting your objectives

**EDUCATION**—Get brochures about statistics in education and programs such as Adopt-a-School, Poster Competition and Project Competition, Student Teacher Network, AP Statistics, and Beyond AP Statistics

*Discover the benefits of membership*



○ **Statpoint Inc.** 301, 303

Herndon, Virginia

STATGRAPHICS Centurion XV, unmatched statistical software for data analysis, statistical modeling, quality improvement, and Six Sigma. Perform sophisticated data analysis without investing weeks learning a statistical package. Entirely menu-driven, numerous innovative tools—including StatAdvisor, StatWizard, and StatReporter—provide maximum return on investment. STATGRAPHICS Mobile for handheld devices also is available.

**StatSoft, Inc.** 401, 403

Tulsa, Oklahoma

StatSoft, Inc., creators of STATISTICA, is one of the largest developers of enterprise-wide and single-user software for data analysis, data mining, and quality control worldwide. STATISTICA has received the highest rating in every comparative review of statistics software since its release in 1993—a record unmatched in the industry.

**Systat Software, Inc.** 325

Richmond, California

Systat Software, Inc., provides specialized scientific software products and services for the environment sciences, life sciences, behavioral sciences, medical research, and engineering. Our products are used by the world's top companies, research centers, and universities and now include SigmaPlot, SigmaStat, SigmaScan, SYSTAT, TableCurve2D, TableCurve3D, PeakFit, and AutoSignal.

**The Cambridge Group Ltd.** 225

Westport, Connecticut

The Cambridge Group Ltd. focuses on careers in biostatistics, clinical data management, clinical systems, SAS programming, and more. Opportunities range from entry through executive levels for both permanent and contract positions in the pharmaceutical and biotechnology industries. The Cambridge Group Ltd., 1175 Post Road East, Westport, CT 06880; [biostat@cambridgegroup.com](mailto:biostat@cambridgegroup.com); (800) 525-3396.

**U.S. Census Bureau** 128, 130

Washington, DC

The U.S. Census Bureau produces key data about the nation's economic and social health. We produce the Decennial Census each decade, the Economic Census every five years, more than 100 household and business surveys each year, and several monthly surveys that supply data for the nation's economic indicators.

**U.S. Department of Agriculture,** 132

**National Agricultural Statistics Service**

Washington, DC

The National Agricultural Statistics Service is a world leader in sampling, data collection, and estimation procedures for economic, environmental, and agricultural surveys and censuses. The agency also creates a number of remote sensing and geographic information system statistical products and conducts ongoing applied research on statistical methodology and estimation.

**U.S. Department of Education** 129

Washington, DC

As the research, evaluation, and statistics-gathering arm of the U.S. Department of Education, the Institute of Education Sciences funds research studies on ways to improve academic achievement, conducts large-scale evaluations of federal education programs, and reports an array of statistics on the condition of education.

**Visual Numerics, Inc.** 302

San Ramon, California

For decades, Visual Numerics has provided analysis and visualization software to academia on platforms such as C/C++, .NET, Java, and FORTRAN. It delivers tools for conducting research and building curricula for students. The unique combination of the IMSL Libraries, PV-WAVE, and expert professional services is unsurpassed for analytical applications.

**W.H. Freeman and Company** 300

New York, New York

W.H. Freeman and Company publishes high-quality textbooks and media in statistics and mathematics. Visit Booth 300 to learn more about the new editions of Moore's *The Basic Practice of Statistics* and Moore/Notz's *Statistics: Concepts and Controversies* and the current edition of Moore/McCabe's *Introduction to the Practice of Statistics*. Also on view will be our innovative media, including our new nationally hosted solution for statistics: StatsPortal. For more information, visit [www.whfreeman.com](http://www.whfreeman.com).

○ **Wiley** 424, 426, 428, 430

Hoboken, New Jersey

John Wiley & Sons, a leading publisher in statistics, provides numerous print and electronic products, including *Encyclopedia of Statistical Sciences (2nd edition)*, *Applied Regression Modeling*, *Bayesian Models for Categorical Data*, *Bayesian Statistics and Marketing*, *Regression Analysis by Example (4th edition)*, *Statistics in Medicine*, and *Data Mining and Statistics*.



## Session Tag Descriptions

We expect both Theme and Applied sessions to draw a diverse audience.

### THEME ☆

JSM Theme sessions are directly relevant to the 2006 JSM theme “Statistics for an Uncertain World: Meeting Global Challenges.” These sessions highlight presentations and discussions on the role that is being played by statistical sciences in the protection and development of people around the globe.. Theme sessions are designed to expand the frontiers of statistical thought, emphasize new directions, and promote interdisciplinary collaborations and partnerships.

### APPLIED ●

JSM Applied sessions have REAL applications at the heart of the discussions and presentations. Because these sessions are grounded in applications across the many areas of science and engineering, they may involve interdisciplinary work and include presentations by nonstatisticians. Applied Sessions vary in scope, ranging from presentations on state-of-the-art statistical methodology applied to real world problems to those that are tutorial in nature. All statisticians should find these sessions appealing.

## Meeting Rooms

Meeting rooms include “letters” before the name of the room, designating in which facility the room is located:

**Washington State Convention & Trade Center = CC**

**Sheraton Seattle Hotel & Towers = S**

**Grand Hyatt Seattle = H**

## THURSDAY, AUGUST 3

### Committee/Business Meetings & Other Activities

6:00 p.m.–7:00 p.m. S-Douglas Room  
**The ASA Management Review Committee (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

7:00 p.m.–9:00 p.m. S-Douglas Room  
**The ASA Board of Directors Executive Committee Working Dinner (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

## FRIDAY, AUGUST 4

### Committee/Business Meetings & Other Activities

7:30 a.m.–8:30 a.m. S-Cedar Room  
**ASA Board of Directors Breakfast (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

8:30 a.m.–10:30 a.m. S-Aspen Room  
**The ASA Planning Committee (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

10:30 a.m.–5:00 p.m. S-Aspen Room  
**The ASA Board of Directors Meeting (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

12:30 p.m.–1:30 p.m. S-Cedar Room  
**The ASA Board of Directors Lunch (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

6:30 p.m.–7:30 p.m. S-Governors Suite  
**JSM Staff and ASA Board of Directors Reception (closed)**  
*Chair(s): William B. Smith, American Statistical Association; Sallie Keller-McNulty, Rice University*

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

## SATURDAY, AUGUST 5

### Committee/Business Meetings & Other Activities

7:00 a.m.–6:00 p.m. CC-Level 4 South Lobby  
**JSM Main Registration**  
**ASA Membership/Special Assistance Desk**  
**Cyber Center**

7:00 a.m.–6:00 p.m. CC-507, CC-508  
**Speaker Work Rooms**

7:30 a.m.–8:30 a.m. S-Cedar Room  
**The ASA Board of Directors Breakfast (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

8:00 a.m.–5:00 p.m. CC-Exhibit Hall 4A  
**Exhibitor Move in and Lounge**

8:30 a.m.–5:30 p.m. S-Aspen Room  
**The ASA Board of Directors Meeting (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

8:30 a.m.–10:30 a.m. S-Spruce Room  
**ASA BOD-2006 Strategic Activities Review**  
**Subcommittee (closed)**  
*Chair(s): Nathaniel Schenker, National Center for Health Statistics*

8:30 a.m.–10:30 a.m. S-Douglas Room  
**ASA BOD-2006 Dues Subcommittee (closed)**  
*Chair(s): Daniel Kasprzyk, Mathematica Policy Research, Inc.*

9:00 a.m.–5:00 p.m. CC-Level 1  
**Citywide Concierge Center**

9:00 a.m.–5:00 p.m. CC-Exhibit Hall 4B  
**Career Placement Service (Electronic Registration Only)**

11:30 a.m.–12:30 p.m. S-Willow A  
**Association of GCRC Statisticians Lunch (closed)**  
*Organizer(s): Robert Oster, The University of Alabama at Birmingham*

12:15 p.m.–1:00 p.m. S-Cedar Room  
**The ASA Board of Directors Lunch (closed)**  
*Chair(s): Sallie Keller-McNulty, Rice University*

12:00 p.m.–5:00 p.m. CC-Level 4 South Lobby  
**ASA Marketplace**

12:30 p.m.–5:30 p.m. S-Willow B  
**Association of GCRC Statisticians Meeting (closed)**  
*Organizer(s): Robert Oster, The University of Alabama at Birmingham*

3:00 p.m.–6:00 p.m. S-Spruce Room  
**ICES III Program Committee Meeting (closed)**  
*Chair(s): Eva Elvers, Statistics Sweden*

7:00 p.m.–8:30 p.m. S-Cedar Room  
**National Numeracy Network Board Meeting**  
*Organizer(s): Bernard Madison, University of Arkansas*

### Continuing Education (Fee Events)

CE\_01C CC-310  
8:30 a.m.–5:00 p.m.  
**Categorical Data Analysis (two-day course)**  
The ASA  
*Instructor(s): Gary Koch, The University of North Carolina at Chapel Hill; Todd Schwartz, The University of North Carolina at Chapel Hill; Rebekkah Dann, The University of North Carolina at Chapel Hill*

CE\_02C CC-308  
8:30 a.m.–5:00 p.m.  
**Small-Area Estimation**  
The ASA, Section on Survey Research Methods  
*Instructor(s): Partha Lahiri, University of Maryland*

CE\_03C CC-307  
8:30 a.m.–5:00 p.m.  
**Modern Approaches to Nonstationary Models of Spatial and Space-Time Processes with Air Quality Applications**  
The ASA  
*Instructor(s): Peter Guttorp, University of Washington; Paul D. Sampson, University of Washington*

CE\_04C CC-306  
8:30 a.m.–5:00 p.m.  
**Bayesian Inference**  
The ASA, Section on Bayesian Statistical Science  
*Instructor(s): Bruno Sanso, University of California, Santa Cruz*

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ❖ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

CE\_05C CC-304  
8:30 a.m.–5:00 p.m.  
**Practical Data Mining**  
The ASA  
*Instructor(s): Richard De Veaux, Williams College*

CE\_06C CC-303  
8:30 a.m.–5:00 p.m.  
**Applied Longitudinal Analysis**  
The ASA, Biometrics Section  
*Instructor(s): Garrett Fitzmaurice, Harvard University*

## SUNDAY, AUGUST 6

### Tours

9:30 a.m.–1:30 p.m. CC-Convention Place  
**TR01 - Northwest Winery Tour (fee event)**

1:00 p.m.–4:00 p.m. CC-Convention Place  
**TR02 - Seattle City Highlights Tour (fee event)**

### Committee/Business Meetings & Other Activities

7:00 a.m.–8:00 a.m. S-Willow A  
**Association of GCRC Statisticians Breakfast (closed)**  
*Organizer(s): Robert Oster, The University of Alabama at Birmingham*

7:00 a.m.–6:00 p.m. CC-507, CC-508  
**Speaker Work Rooms**

7:00 a.m.–8:30 p.m. CC-Level 4 South Lobby  
**JSM Main Registration**  
**ASA Membership/Special Assistance Desk**

7:00 a.m.–10:00 p.m. CC-Level 4 South Lobby  
**Cyber Center**

7:30 a.m.–10:30 a.m. S-Douglas Room  
**Committee on Women in Statistics (closed)**  
*Chair(s): Teri Peterson, Idaho State University*

7:30 a.m.–12:30 p.m. H-Blewett Suite  
**Committee on Publications Meeting (closed)**  
*Chair(s): William Q. Meeker, Jr., Iowa State University*

8:00 a.m.–10:00 a.m. S-Juniper  
**Business Statistics Focus Group (closed)**  
*Organizer(s): Dona Kenly, Addison Wesley*

8:00 a.m.–11:00 a.m. CC-Exhibit Hall 4A  
**Exhibitor Move in**

8:00 a.m.–12:00 p.m. S-Willow B  
**Association of GCRC Statisticians Meeting (closed)**  
*Organizer(s): Robert Oster, The University of Alabama at Birmingham*

8:00 a.m.–12:00 p.m. CC-302  
**ICES III Organizing Committee Meeting (closed)**  
*Chair(s): Howard Hogan, U.S. Census Bureau*

8:00 a.m.–6:00 p.m. CC-209  
**Amgen Inc. Interview Room (by invitation only)**  
*Organizer(s): Chander Varma, Amgen Inc.*

8:00 a.m.–6:00 p.m. CC-Exhibit Hall 4A  
**Exhibitor Lounge**

9:00 a.m.–12:00 p.m. S-Cedar Room  
**Council of Sections Governing Board Meeting (closed)**  
*Chair(s): John E. Boyer, Kansas State University*

9:00 a.m.–1:00 p.m. CC-301  
**Advisory Committee on Teacher Enhancement Annual Meeting (closed)**  
*Chair(s): Robert Gould, University of California, Los Angeles*

9:00 a.m.–5:00 p.m. CC-Level 1  
**Citywide Concierge Center**

9:00 a.m.–5:00 p.m. CC-Level 4 South Lobby  
**ASA Marketplace**

11:00 a.m.–2:00 p.m. CC-4C-1  
**NISS/SAMSI Affiliates Meeting (closed)**  
*Organizer(s): Alan Karr, National Institute of Statistical Sciences*

11:30 a.m.–1:00 p.m. S-Douglas Room  
**Committee on Committees Meeting (closed)**  
*Chair(s): Darryl Downing, GlaxoSmithKline*

12:00 p.m.–1:00 p.m. S-Willow A  
**Association of GCRC Statisticians Lunch (closed)**  
*Organizer(s): Robert Oster, The University of Alabama at Birmingham*

Thurs-Sun

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

- 12:00 p.m.–1:30 p.m. H-Portland  
**Amgen Inc. (closed)**  
*Organizer(s): Chander Varma, Amgen Inc.*
- 12:00 p.m.–1:30 p.m. CC-601  
**Friends of the Indian Statistical Institute Business Meeting**  
*Organizer(s): Nitish Mukhopadhyay, University of Connecticut*
- 12:00 p.m.–2:00 p.m. S-Juniper  
**Journal of Statistics Education Editorial Board (closed)**  
*Chair(s): W. Robert Stephenson, Iowa State University*
- 12:00 p.m.–2:00 p.m. S-Aspen Room  
**Statistica Sinica Board Meeting (closed)**  
*Organizer(s): Michelle Liou, Academia Sinica; Xiao-Li Meng, Harvard University*
- 1:00 p.m.–6:00 p.m. CC-Exhibit Hall 4A  
**EXPO 2006**  
**ASA Communities Booth #101**
- 1:00 p.m.–6:00 p.m. CC-Exhibit Hall 4B  
**Career Placement Service (Full Placement Service Open)**
- 2:00 p.m.–4:30 p.m. S-Willow Ballroom  
**Council of Sections Annual Business Meeting (closed)**  
*Chair(s): John E. Boyer, Kansas State University*
- 4:00 p.m.–5:30 p.m. S-Douglas Room  
**2006/2007 Committee Chairs Meeting (closed)**  
*Chair(s): Darryl Downing, GlaxoSmithKline*
- 4:00 p.m.–6:00 p.m. H-Stevens Boardroom & Foyer  
**Career Development Seminar - Snakes and Ladders: Building a Career in Statistics**  
*Chair(s): Janice Lent, Research and Innovative Technology Administration*
- 4:30 p.m.–8:00 p.m. H-Chatham  
**ENAR Executive Committee Meeting (by invitation only)**  
*Organizer(s): Kathy Hoskins, ENAR*
- 5:00 p.m.–6:00 p.m. CC-303  
**Volunteer Work in Statistics: The Second Year**  
*Chair(s): Fritz Scheuren, National Opinion Research Center*
- 5:00 p.m.–6:30 p.m. CC-305  
**Cancer Center Biostatistics Directors Annual Meeting**  
*Organizer(s): Terry Hyslop, Thomas Jefferson University*
- 5:00 p.m.–6:30 p.m. S-Cedar Room  
**Council of Section New Officer Orientation Meeting (closed)**  
*Chair(s): S. Lynne Stokes, Southern Methodist University*
- 5:00 p.m.–7:30 p.m. H-Blewett Suite  
**International Chinese Statistical Association (ICSA) Board Meeting (closed)**  
*Organizer(s): Ivan Chan, Merck & Co., Inc.*
- 5:30 p.m.–7:00 p.m. CC-302  
**Committee on Scientific Freedom and Human Rights Business Meeting**  
*Chair(s): Susan Hinkins, National Opinion Research Center*
- 6:00 p.m.–7:30 p.m. CC-4C-2  
**JSM First-Time Attendee Orientation and Reception**  
*Chair(s): Mary W. Gray, American University*
- 6:00 p.m.–7:30 p.m. CC-612  
**ASA Open Meeting (all welcome)**  
*Chair(s): Sallie Keller-McNulty, Rice University*
- 6:00 p.m.–7:30 p.m. S-Aspen Room  
**Christian Statisticians' Informal Discussion**  
*Organizer(s): Robert W. Mee, University of Tennessee*
- 6:30 p.m.–8:00 p.m. S-Douglas Room  
**Committee on Privacy and Confidentiality (closed)**  
*Chair(s): Kim McGuigan, Pfizer, Inc.*
- 6:30 p.m.–8:00 p.m. CC-4C-3  
**Purdue University Alumni and Friends Reception**  
*Organizer(s): Dana Neary, Director of Alumni Relations*
- 6:30 p.m.–8:30 p.m. off property  
**Section on Statistical Consulting Executive Committee Meeting (closed)**  
*Chair(s): Philip Dixon, Iowa State University*
- 6:30 p.m.–9:30 p.m. H-Douglas Boardroom & Foyer  
**Biometrics Section Executive Committee Meeting (closed)**  
*Chair(s): Karen Bandeen-Roche, The Johns Hopkins Bloomberg School of Public Health*

*American Statistical Association*

# OPEN MEETING

**Sallie Keller-McNulty, ASA President**

Sunday, August 6, 2006, 6:00 p.m.

Washington State Convention & Trade Center  
Room 612



## FIND OUT WHAT YOUR ASSOCIATION IS DOING!

Come to the open meeting, meet your officers, hear about the following items—among others—and voice your opinions about the ASA:

- ▶ 2006 State of the Association – *Sallie Keller-McNulty*
- ▶ Update on finances – *Sastry G. Pantula*
- ▶ Status of the ASA building – *William B. Smith*
- ▶ Summary of 2005 Board task forces – *Fritz J. Scheuren*
- ▶ Responses to 2005 Open Meeting questions – *Executive Committee*
- ▶ Reports on 2006 task forces (public policy, security, and interaction with other groups)

*Please plan to attend and lend your voice to the discussion of important issues affecting the future of the ASA.*





# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

7:00 p.m.–8:00 p.m. CC-4C-1

## ACCE Presenters' Social (closed)

*Chair(s): Charles Tan, Merck & Co., Inc.*

7:00 p.m.–9:00 p.m. CC-615

## Isolated Statisticians Meeting

*Organizer(s): Ann Cannon, Cornell College*

8:00 p.m.–10:30 p.m. CC-Ballroom 6ABC

## JSM Opening Mixer (included in registration fee)

---

## Continuing Education (Fee Events)

---

CE\_01C CC-310

8:30 a.m.–5:00 p.m.

### Categorical Data Analysis (two-day course)

The ASA

*Instructor(s): Gary Koch, The University of North Carolina at Chapel Hill; Todd Schwartz, The University of North Carolina at Chapel Hill; Rebekkah Dann, The University of North Carolina at Chapel Hill*

CE\_07C CC-309

8:30 a.m.–5:00 p.m.

### Text Mining

The ASA, Section on Statistical Computing

*Instructor(s): David Madigan, Rutgers University; David D. Lewis, David D. Lewis Consulting LLC*

CE\_08C CC-305

8:30 a.m.–5:00 a.m.

### The Psychology of Survey Response

The ASA, Section on Survey Research Methods

*Instructor(s): Roger Tourangeau, University of Maryland*

CE\_09C CC-307

8:30 a.m.–5:00 p.m.

### Statistical Methods for the Confirmatory Analysis of Equivalence/Noninferiority Studies

The ASA

*Instructor(s): Stefan Wellek, University of Heidelberg*

CE\_10C CC-306

8:30 a.m.–5:00 p.m.

### Computational Statistics: Methods for Monte Carlo Integration and Optimization

The ASA, Section on Statistical Computing

*Instructor(s): Jennifer A. Hoeting, Colorado State University; Geof H. Givens, Colorado State University*

CE\_11C CC-308

8:30 a.m.–5:00 p.m.

### Regression Modeling Strategies

The ASA

*Instructor(s): Frank E. Harrell, Jr., Vanderbilt University School of Medicine*

CE\_12C CC-304

8:30 a.m.–5:00 p.m.

### Hierarchical Bayes Methods and Software for Data Analysis

The ASA, Section on Bayesian Statistical Science

*Instructor(s): Bradley P. Carlin, University of Minnesota; Thomas A. Louis, The Johns Hopkins University*

CE\_13C CC-303

8:30 a.m.–5:00 p.m.

### Generalized Linear Mixed Models: Theory and Applications

The ASA

*Instructor(s): Oliver Schabenberger, SAS Institute, Inc.*

---

## Special Presentation 2:00 p.m.–3:50 p.m.

---

1 CC-4C-4

### Introductory Overview Lectures: Genetic Association Studies—Other

The ASA, ENAR, IMS, SSC, WNAR

*Organizer(s): Jianwen Cai, The University of North Carolina at Chapel Hill*

*Chair(s): Barry I. Graubard, National Cancer Institute*

2:05 p.m. Association Mapping of Human Disease Genes—  
◆ Bruce S. Weir, University of Washington

2:55 p.m. Statistical Analysis of Haplotype-Disease Association—  
◆ Danyu Lin, The University of North Carolina at Chapel Hill

3:45 p.m. Floor Discussion

---

## Invited Sessions 2:00 p.m.–3:50 p.m.

---

2 CC-206

### Seasonal Time Series—Invited

Business and Economics Statistics Section

*Organizer(s): Stuart Scott, Bureau of Labor Statistics*

*Chair(s): Brian C. Monsell, U.S. Census Bureau*

2:05 p.m. Comparing MSEs for Finite X-11 and Model-Based Seasonal Adjustment Filters—  
◆ William R. Bell, U.S. Census Bureau; Yea-Jane Chu, SPSS Inc.; George C. Tiao, The University of Chicago

You are invited to the JSM  
**FIRST-TIME**  
**ATTENDEE**  
orientation and reception

Washington State Convention & Trade Center, Room 4C-2  
Sunday, August 6  
6:00 p.m.–7:30 p.m.

OPEN TO ALL

*(Dinner groups will form after the reception.)*

**Learn more about how to get the most out of your  
1st JSM experience, meet new people, and network.**

**AGENDA**

- **Introduction:** Mary Gray, President, The Caucus for Women in Statistics
- **“Networking for Fun and Profit”** Monica Jackson, American University
- **Reception** *(light hors d’oeuvres to be served)*

*This reception is sponsored by: ASA, ENAR, IMS, SSC, WNAR, The Caucus for Women in Statistics*



# GENERAL PROGRAM SCHEDULE

⊛ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

2:30 p.m. **A Spectral Approach for Locally Assessing Model Misspecification**—Tucker S. McElroy, U.S. Census Bureau; ◆ Scott Holan, University of Missouri-Columbia

2:55 p.m. **Nonlinear Seasonal Adjustment in Unobserved Components Models**—◆ Siem Jan Koopman, Vrije Universiteit Amsterdam; Kai Ming Lee, Vrije Universiteit Amsterdam

3:20 p.m. Disc: Xichuan Zhang, Australian Bureau of Statistics

3:40 p.m. **Floor Discussion**

## 3 CC-615 ● ⊛ **Recent Advances in the Design and Analysis of Clinical Trials—Invited**

WNAR, Biometrics Section, ENAR

*Organizer(s): Lurdes Y. T. Inoue, University of Washington*

*Chair(s): Kenneth Rice, University of Washington*

2:05 p.m. **A Bayesian Seamless Design**—◆ Lurdes Y. T. Inoue, University of Washington

2:30 p.m. **A Geometric Approach to Comparing Treatments for Rapidly Fatal Diseases**—◆ Peter F. Thall, M. D. Anderson Cancer Center; Leiko H. Wooten, M. D. Anderson Cancer Center; Elizabeth J. Shpall, M. D. Anderson Cancer Center

2:55 p.m. **Advances in Simple Phase I Trials: Three Examples**—◆ Rick Chappell, University of Wisconsin-Madison

3:20 p.m. **Decision Analysis and Clinical Trial Design**—◆ Donald Berry, The University of Texas

3:45 p.m. **Floor Discussion**

## 4 CC-609 **Rapid Production of Small-Area Estimates Using the Behavioral Risk Factor Surveillance System—Invited**

Section on Survey Research Methods, Section on Health Policy Statistics

*Organizer(s): Paul S. Levy, RTI International*

*Chair(s): Babubhat V. Shah, SAFAL Institute Inc.*

2:05 p.m. **Rapid Response Health Surveillance and the Utility of Small-Area Estimates: Responding to the 2004–05 Influenza Vaccine Shortage**—◆ Michael W. Link, Centers for Disease Control and Prevention; Ali H. Mokdad, Centers for Disease Control and Prevention

2:30 p.m. **Development of Methodology for Production of Rapidly Available, County-Level, Small-Area Estimates To Monitor the Course of Influenza Vaccine Coverage**—◆ Haomiao Jia, Mercer University School of Medicine; Michael W. Link, Centers for Disease Control and Prevention; Ali H. Mokdad, Centers for Disease Control and Prevention; James Holt, Centers for Disease Control and Prevention; Lei Li, RTI International; Paul S. Levy, RTI International

2:55 p.m. **Evaluating the Small-Area Estimates of the 2004–05 County-Level Influenza Vaccination Rates**—◆ Lei Li, RTI International; Paul S. Levy, RTI International; Akhil Vaish, RTI International; Michael W. Link, Centers for Disease Control and Prevention; Ali H. Mokdad, Centers for Disease Control and Prevention; Lina Balluz, Centers for Disease Control and Prevention; Haomiao Jia, Mercer University School of Medicine

3:20 p.m. Disc: Tapabrata Maiti, Iowa State University

3:40 p.m. **Floor Discussion**

## 5 CC-3A ● ⊛ **Pipeline Issues in Recruiting Federal Statisticians—Invited**

Committee on Membership Retention and Recruitment, Section on Statistical Education, Committee on Career Development

*Organizer(s): David Banks, Duke University*

*Chair(s): Dayanand Naik, Old Dominion University*

2:05 p.m. **JPSM: 14 Years of Training Federal Statisticians**—◆ Richard Valliant, University of Michigan; Roger Tourangeau, University of Maryland

2:30 p.m. **Gulliver Tied down by Red Tape? The Federal Government's Challenges as an Employer of Statisticians**—◆ Janice Lent, Research and Innovative Technology Administration

2:55 p.m. **Federal Statisticians in the Physical and Engineering Sciences**—◆ William Guthrie, National Institute of Standards and Technology

3:20 p.m. Disc: David Marker, Westat

3:40 p.m. **Floor Discussion**

## 6 CC-3B ⊛ **Surveillance Geoinformatics and Hotspot Dynamics for Prediction, Policy, and Management—Invited**

Environmental and Ecological Statistics, Section on Statistics and the Environment

*Organizer(s): Ganapati P. Patil, The Pennsylvania State University*

*Chair(s): Ganapati P. Patil, The Pennsylvania State University*

- 2:05 p.m. Spatiotemporal Geoinformatic Disease Surveillance**—❖ Stephen L. Rathbun, University of Georgia; Ganapati P. Patil, The Pennsylvania State University
- 2:30 p.m. Crime Mapping and Hotspot Detection**—❖ Reza Modarres, The George Washington University; Ganapati P. Patil, The Pennsylvania State University
- 2:55 p.m. Applications of Hotspot Detection Analysis to Large-Scale Plant Disease Forecasting: Case Study of Fusarium Head Blight**—❖ Murali Haran, The Pennsylvania State University
- 3:20 p.m. Disc: Bo Ranney, Swedish University of Agricultural Sciences**
- 3:40 p.m. Floor Discussion**

## 7 CC-400 ● **Density-Based Clustering—Invited**

Section on Statistical Computing, Section on Statistical Graphics, Section on Nonparametric Statistics

*Organizer(s): David W. Scott, Rice University*

*Chair(s): Michael W. Trosset, The College of William & Mary*

- 2:05 p.m. Variable Bandwidth Mode Testing**—❖ Michael C. Minnotte, Utah State University
- 2:30 p.m. Generalized Single-Linkage Clustering**—❖ Werner Stuetzle, University of Washington; Rebecca Nugent, University of Washington
- 2:55 p.m. Mixture Model Building for High-Dimensional and Functional Data**—❖ Catherine Loader, The University of Auckland; Ramani S. Pilla, Case Western Reserve University
- 3:20 p.m. Disc: David W. Scott, Rice University**
- 3:40 p.m. Floor Discussion**

## 8 CC-614 ● **Statistical Methods for Oral Health Research—Invited**

ENAR, Biometrics Section, WNAR

*Organizer(s): Jason Roy, University of Rochester*

*Chair(s): Julie Stoner, University of Nebraska Medical Center*

- 2:05 p.m. Analysis of Correlated Dental Data: Challenges and Recent Developments**—❖ Brian G. Leroux, University of Washington
- 2:30 p.m. Finding the Right Pair of Genes: Adding a Genetic Component to Existing Oral Health Studies**—❖ Deborah V. Dawson, The University of Iowa
- 2:55 p.m. A Flexible Model for Recurrent Event Outcomes in Oral Health**—❖ Elizabeth H. Slate, Medical University of South Carolina; Edsel A. Pena, University of South Carolina
- 3:20 p.m. Statistical Approaches for Dealing with Missing Tooth- and Surface-Level Data in Caries Research**—❖ Jason Roy, University of Rochester
- 3:45 p.m. Floor Discussion**

## 9 CC-620 ● **Empirical Likelihood-Based Semiparametric Inference—Invited**

Biometrics Section, Section on Nonparametric Statistics

*Organizer(s): Hua Liang, University of Rochester Medical Center*

*Chair(s): Xiaogang (Steven) Wang, York University*

- 2:05 p.m. Empirical Likelihood-Based Inference for Comparison of Two Populations with Censored Data**—❖ Hua Liang, University of Rochester Medical Center
- 2:30 p.m. Empirical Likelihood-Based Inferences for Receiver Operating Characteristic Curves in the Presence of Verification Bias**—❖ Jing Qin, National Institute of Allergy and Infectious Diseases
- 2:55 p.m. Empirical Likelihood for Accelerated Failure Time Model**—❖ Mai Zhou, University of Kentucky
- 3:20 p.m. Nonparametric Imputation of Missing Values for Estimating Equation-Based Empirical Likelihood Inference**—Song X. Chen, Iowa State University; ❖ Dong Wang, University of Nebraska
- 3:45 p.m. Floor Discussion**

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ❖ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

## 10 CC-203 ● **New Directions in Bayesian Joint Modeling of Longitudinal and Survival Data—Invited**

Section on Bayesian Statistical Science, Biometrics Section, WVAR, ENAR

*Organizer(s): Timothy Hanson, University of Minnesota*

*Chair(s): Timothy Hanson, University of Minnesota*

- 2:05 p.m. **A Flexible B-Spline Model for Multiple Longitudinal Biomarkers and Survival—**  
❖ Elizabeth Brown, University of Washington
- 2:35 p.m. **Extensions of the Standard Joint Model—**  
❖ Jeremy M. G. Taylor, University of Michigan
- 3:05 p.m. **Bayesian Semiparametric Methods for Joint Modeling of Longitudinal and Survival Data—**  
❖ Adam Branscum, University of Kentucky;  
Timothy Hanson, University of Minnesota; Wesley O. Johnson, University of California, Irvine
- 3:35 p.m. **Floor Discussion**

## 11 CC-604 ● **Modern Monte Carlo Methods for Statistical Inference—Invited**

IMS, Section on Bayesian Statistical Science, Section on Nonparametric Statistics

*Organizer(s): Anthony Brockwell, Carnegie Mellon University*

*Chair(s): Arnaud Doucet, The University of British Columbia*

- 2:05 p.m. **An Overview of SMC and Adaptive MCMC—**  
❖ Anthony Brockwell, Carnegie Mellon University
- 2:35 p.m. **Simulated Tempering Made Easy—**❖ Yves Atchade, University of Ottawa
- 3:05 p.m. **Adaptive Monte Carlo Computing Methods—**  
❖ Christophe Andrieu, University of Bristol
- 3:35 p.m. **Floor Discussion**

---

## **Topic-Contributed Sessions** 2:00 p.m.–3:50 p.m.

---

## 12 CC-606 ● **Advances in Item Response Theory—Topic-Contributed**

Social Statistics Section

*Organizer(s): Sandip Sinharay, Educational Testing Service*

*Chair(s): Guowen Sun, sanofi-aventis*

- 2:05 p.m. **Limited Information Goodness-of-Fit Testing in Multidimensional Contingency Tables—**❖ Harry Joe, The University of British Columbia

- 2:25 p.m. **Sensitivity of Latent Trait Analysis to Highly Skewed Ability Distributions—**❖ David Dailey, Woodcock-Munoz Foundation; Elena Erosheva, University of Washington
- 2:45 p.m. **Checking the Appropriateness of the Statistical Model Used in National Assessment of Educational Progress—**❖ Sandip Sinharay, Educational Testing Service
- 3:05 p.m. **Improve Variance Estimation for the Assessments Based on the Plausible Values Approach—**❖ Jiahe Qian, Educational Testing Service; Shelby Haberman, Educational Testing Service
- 3:25 p.m. **Estimation of Measurement Errors at Observed and Scaled Scores—**❖ Michelle Liou, Academia Sinica; Philip E. Cheng, Academia Sinica
- 3:45 p.m. **Floor Discussion**

## 13 CC-619 ● **Bayesian Modeling of Biomedical Data—Topic-Contributed**

Biometrics Section, Section on Bayesian Statistical Science, WVAR, ENAR

*Organizer(s): W. John Boscardin, University of California, Los Angeles*

*Chair(s): Joseph W. Hogan, Brown University*

- 2:05 p.m. **Analysis of Longitudinal Clinical Trial Data with Informative Dropout—**❖ Xiaohong Yan, University of California, Los Angeles; W. John Boscardin, University of California, Los Angeles
- 2:25 p.m. **Bayesian Approach to Multiple Changepoint with Application to HIV Immunologic Responses—**  
❖ Pulak Ghosh, Georgia State University; Kaushik Ghosh, New Jersey Institute of Technology; Ram Tiwari, National Institutes of Health
- 2:45 p.m. **Bayesian Model Checking for a Longitudinal Binary Variable—**❖ Catherine Crespi, University of California, Los Angeles; W. John Boscardin, University of California, Los Angeles; William G. Cumberland, University of California, Los Angeles
- 3:05 p.m. **Modeling Multivariate Biomedical Data with Polynomial Smoothing Splines—**❖ Hector Lemus, University of California, Los Angeles; W. John Boscardin, University of California, Los Angeles
- 3:25 p.m. **Real-Time Learning for Heterogeneous Multivariate Longitudinal Data—**❖ W. John Boscardin, University of California, Los Angeles; Hector Lemus, University of California, Los Angeles
- 3:45 p.m. **Floor Discussion**



The standard  
against which  
all other  
data mining  
tools are judged.

## CART®

Salford Systems' CART is the only classification and regression tree software based on the original proprietary source code developed by Breiman, Friedman, Olshen, and Stone. We have been working with these researchers since 1990 to perfect the engine to give you a celebrated and award-winning system.



Jerome Friedman's MARS (Multivariate Adaptive Regression Splines) is stepwise regression done right for the first time. MARS does variable selection, variable transformation, interaction detection, and self-testing to prevent overfitting, all automatically. Like CART, there is only one trademarked MARS and it is available exclusively from Salford Systems.



TreeNet, Jerome Friedman's latest data mining tool, is based on boosted decision trees. TreeNet is an astonishingly accurate model builder and function approximation system that also serves as a powerful initial data exploration tool. Use TreeNet to extract the most important relationships in your data and calibrate how predictable the outcomes are. Then either use the TreeNet model directly or incorporate the results in CART, MARS, or conventional statistical models.



Random Forests, Leo Breiman's latest data mining technology, is based on learning ensembles of CART trees. By judiciously injecting randomness into the tree building process and then combining hundreds of these trees, RF is able to deliver high performance predictive models and a variety of novel exploratory data analysis results.

### About Salford Systems

Salford Systems is an award-winning data mining software development and consulting company with a proven record of technical and practical excellence. Applications in both software and consulting span market research segmentation, direct marketing, fraud detection, credit scoring, risk management, bio-medical research and manufacturing quality control. Industries using Salford Systems products and consultation services include telecommunications, transportation, banking, financial services, insurance, health-care, manufacturing, retail and catalog sales, and education. Salford Systems' software is installed at more than 3,500 sites worldwide, including 300 major Universities.



# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

## 14 CC-401 ● **Planning Medical Device Studies—Topic-Contributed**

Biopharmaceutical Section, Biometrics Section, ENAR

*Organizer(s): Philip Lavin, Averion Inc.; Greg Campbell, U.S. Food and Drug Administration*

*Chair(s): Greg Campbell, U.S. Food and Drug Administration*

- 2:05 p.m. **Statistical Myths in the Design and Analysis of Clinical Trials**—◆Victor Hasselblad, Duke University
- 2:25 p.m. **New Medical Device? When Clinical Data Are Needed for a New Medical Device**—◆Jeng Mah, American Medical Systems Inc.
- 2:45 p.m. **Statistical Review Quality Assessment for Therapeutic PMA Submissions**—◆Lilly Yue, U.S. Food and Drug Administration
- 3:05 p.m. **What Device Pivotal Studies Have in Common: Recurring Themes in Study Planning**—◆Philip Lavin, Averion Inc.
- 3:25 p.m. **Floor Discussion**

## 15 CC-204 ● **Bayesian Student Paper Competition II—Topic-Contributed**

Section on Bayesian Statistical Science

*Organizer(s): Steven N. MacEachern, The Ohio State University*

*Chair(s): Steven L. Scott, University of Southern California*

- 2:05 p.m. **Statistical Inference for Nonlinear Models Involving Ordinary Differential Equations**—  
◆Lovely Goyal, North Carolina State University;  
Sujit Ghosh, North Carolina State University
- 2:25 p.m. **Weighted Model-Based Clustering for Remote Sensing Image Analysis**—◆Joseph Richards, Carnegie Mellon University; Johanna Hardin, Pomona College
- 2:45 p.m. **On Bayesian Analysis of Generalized Linear Models Using Jacobian Technique**—◆Sourish Das, University of Connecticut; Dipak Dey, University of Connecticut
- 3:05 p.m. **Using Incompatibility To Build Fast Gibbs Samplers**—◆Taeyoung Park, Harvard University; David A. van Dyk, University of California, Irvine
- 3:25 p.m. **Improving Classification When a Class Hierarchy Is Available Using a Hierarchy-Based Prior**—  
◆Babak Shahbaba, University of Toronto;  
Radford Neal, University of Toronto
- 3:45 p.m. **Floor Discussion**

## 16 CC-602 ● ⊕ **IT Process Monitoring and Planning—Topic-Contributed**

Section on Physical and Engineering Sciences

*Organizer(s): Yasuo Amemiya, IBM T. J. Watson Research Center*

*Chair(s): Yasuo Amemiya, IBM T. J. Watson Research Center*

- 2:05 p.m. **Fourier Domain Estimation for Network Tomography**—◆Jin Cao, Bell Labs, Lucent Technologies; Aiyou Chen, Bell Labs, Lucent Technologies; Tian Bu, Bell Labs, Lucent Technologies
- 2:25 p.m. **Robust Estimation for Zero-Inflated Longitudinal Data with Application to IT System Monitoring**—  
◆Jing Shen, University of Georgia/IBM; Daniel Hall, University of Georgia
- 2:45 p.m. **Some Statistical Problems in Capacity Management and Planning for on-Demand Computing Services**—◆Ta-Hsin Li, IBM T. J. Watson Research Center
- 3:05 p.m. **Modeling Multivariate Time Series with Application to Software Defects Data**—  
◆Mihaela Serban, Carnegie Mellon University;  
Wanli Min, IBM T. J. Watson Research Center
- 3:25 p.m. **Improving Service Delivery Process**—◆Wen-Hua Ju, Avaya Labs Research; Lorraine Denby, Avaya Labs Research; James M. Landwehr, Avaya Labs Research
- 3:45 p.m. **Floor Discussion**

## 17 CC-201 ● **Statistical and Quantitative Literacy 2006—Topic-Contributed**

Section on Statistical Education, Section on Teaching Statistics in the Health Sciences

*Organizer(s): Milo Schield, Augsburg College*

*Chair(s): Jerry Moreno, John Carroll University*

- 2:05 p.m. **Increasing Quantitative Literacy through the Mathematics across the Community College Curriculum Project**—◆Rebecca Hartzler, Seattle Central Community College; Kim Rheinlander, Dartmouth College
- 2:25 p.m. **Quirks of Rhetoric: a Quantitative Analysis of Quantitative Reasoning in Student Writing**—  
◆Neil Lutsky, Carleton College; Scott Bierman, Carleton College
- 2:45 p.m. **Common Misconceptions in Statistical Literacy**—  
◆Marc Isaacson, Augsburg College

- 3:05 p.m. **Statistical Literacy: Graphs, Studies, and Related Confounders**—❖Milo Schield, Augsburg College
- 3:25 p.m. **Pedagogical Challenges of Quantitative Literacy**—❖Bernard Madison, University of Arkansas
- 3:45 p.m. **Floor Discussion**

## 18 CC-205

### ⊛ **SAMSI Program on National Defense and Homeland Security: 2005–2006—Topic-Contributed**

Section on Statisticians in Defense and National Security

*Organizer(s): Michael Last, National Institute of Statistical Sciences*

*Chair(s): Michael Last, National Institute of Statistical Sciences*

- 2:05 p.m. **A Study of Data Swapping for Categorical Variables**—❖Lisa R. Denogean, SAMSI
- 2:25 p.m. **Anomaly Detection**—❖Francisco Vera, National Institute of Statistical Sciences
- 2:45 p.m. **New Measures of Data Utility**—❖Mi-Ja Woo, National Institute of Statistical Sciences
- 3:05 p.m. **Agent-Based Methods for Dynamic Social Networks**—❖Eric Vance, Duke University; David Banks, Duke University
- 3:25 p.m. **Disc: Alan Karr, National Institute of Statistical Sciences**
- 3:45 p.m. **Floor Discussion**

## 19 CC-613

### ● ⊛ **Estimation Techniques for Diagnostics Devices—Topic-Contributed**

Section on Statistics in Epidemiology, Biometrics Section, Section on Physical and Engineering Sciences

*Organizer(s): Roseann White, Guidant Corporation*

*Chair(s): David Snead, CORDIS*

- 2:05 p.m. **Evaluation of a Noninvasive Diagnostic Device Using Weighted Least Squares Approach**—❖Zhen Huang, Duke Clinical Research Institute; Huiman Barnhart, Duke University
- 2:25 p.m. **System Accuracy Requirements for Blood Glucose Monitors**—❖Nancy Schatz, Home Diagnostics, Inc.
- 2:45 p.m. **Bayesian Predictive Probability as a Diagnostic Assessment of the Likelihood of Coronary Artery Disease in Collateral Arteries**—❖Laura Thompson, U.S. Food and Drug Administration

- 3:05 p.m. **Disease Diagnosis Maximizing Effectiveness and Minimizing Cost of Health Care**—❖Jeffrey Vaks, Beckman Coulter, Inc.
- 3:25 p.m. **Use of Frequency Domain Measures Instead of Traditional Summary Statistics for Use in Diagnostic Devices**—❖Roseann White, Guidant Corporation
- 3:45 p.m. **Floor Discussion**

---

## Regular Contributed Sessions 2:00 p.m.–3:50 p.m.

---

## 20 CC-607

### **Types of Modes and Effects on Response Rates and Performance—Contributed**

Social Statistics Section

*Chair(s): Kristin Stettler, U.S. Census Bureau*

- 2:05 p.m. **A Repeated Measures Design To Investigate Mode Effects in the Center for Epidemiologic Studies Depression Scale**—❖Richard Swartz, M. D. Anderson Cancer Center; Carl de Moor, Harvard Medical School; Karon Cook, University of Washington; Rachel T. Fouladi, Simon Fraser University; Karen Basen-Engquist, M. D. Anderson Cancer Center; Cathy Eng, M. D. Anderson Cancer Center
- 2:20 p.m. **Making Item Selection More Efficient in Computerized Adaptive Testing**—❖Hua-Hua Chang, University of Illinois; Zhiliang Ying, Columbia University
- 2:35 p.m. **Floor Discussion**

## 21 CC-618

### **Functional Data Analysis, Supervised Learning, and Dimension Reduction—Contributed**

Biometrics Section, Section on Nonparametric Statistics, ENAR

*Chair(s): Carsten Botts, Williams College*

- 2:05 p.m. **Functional Regression Analysis for Longitudinal Data with a Large Number of Repeated Measures**—❖Xiaowei Yang, University of California, Davis; Hongquan Xu, University of California, Los Angeles; Qing Shen, Edmonds.com
- 2:20 p.m. **Self-Modeling Regression with Application to Arterial Pulse Pressure Waveforms**—❖Lyndia Brumback, University of Washington; Doug



# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

- Tommet, University of Washington; Richard Kronmal, University of Washington
- 2:35 p.m. **Classification and Gene Selection of Cancer Micro-Arrays by nu-Ridge Regression**—◆ Jun Luo, Michigan State University
- 2:50 p.m. **Boosting with Missing Predictors**—◆ Ching-Yun Wang, Fred Hutchinson Cancer Research Center; Ziding Feng, Fred Hutchinson Cancer Research Center
- 3:05 p.m. **Prediction Based on Two-Stage Modeling**—Amita K. Manatunga, Emory University; ◆ Jose N. G. Binongo, Emory University; Ming Yuan, Georgia Institute of Technology
- 3:20 p.m. **Steps Toward Individualized Treatment: a Double Supervised Machine-Learning Method**—◆ Steven Y. Cen, University of Southern California; Catherine Sugar, University of Southern California; Bryan Langholz, Keck School of Medicine of USC; David Conti, University of Southern California; Doug Stahl, City of Hope National Medical Center; Stanley P. Azen, University of Southern California
- 3:35 p.m. **On Reducing Multiple Outcomes into a Single Score**—◆ Hui Xie, Boston University

## 22 CC-617 ● Regression for Censored Data—Contributed

Biometrics Section, ENAR

*Chair(s): Debajyoti Sinha, Medical University of South Carolina*

- 2:05 p.m. **Regression Analysis for Long-Term Survival Rate**—◆ Yichuan Zhao, Georgia State University
- 2:20 p.m. **Accelerated Failure Time Model with Random Effects**—◆ Yaqin Wang, Iowa State University; Kenneth Koehler, Iowa State University
- 2:35 p.m. **Penalized Weighted Least Squares Method for Accelerated Failure Time Models with Gene Expression Data**—◆ Simin Hu, Case Western Reserve University; J. S. Rao, Case Western Reserve University
- 2:50 p.m. **On Linear Regression under the Partial Koziol-Green Model of Random Censorship**—◆ Ke Wu, California State University, Fresno
- 3:05 p.m. **Inference for Interval-Censored Data with Different Censoring Patterns among Treatment Groups**—◆ Guozhi Gao, Amgen Inc.; Xiang Zhang, Amgen Inc.; Steven Snapinn, Amgen Inc.; Qi Jiang, Amgen Inc.

- 3:20 p.m. **Additive Hazards Model for Case-2 Interval-Censored Failure Time Data**—◆ Lianming Wang, University of Missouri-Columbia; Jianguo Sun, University of Missouri-Columbia; Xingwei Tong, University of Missouri-Columbia
- 3:35 p.m. **Statistical Analysis of Multivariate Failure Time Data with Auxiliary Covariates**—◆ Zhaozhi Fan, Memorial University of Newfoundland

## 23 CC-616 ● Normalization and Analysis of Microarrays—Contributed

Biometrics Section, ENAR

*Chair(s): Dean Billheimer, Vanderbilt University*

- 2:05 p.m. **Two Extensions of the TW-SLM for Systematically Incorporating Control Genes and Spot Quality Information To Improve Normalization of cDNA Microarray Data**—◆ Deli Wang, The University of Alabama at Birmingham; Cun-Hui Zhang, Rutgers University; Marcelo B. Soares, Northwestern University; Jian Huang, The University of Iowa
- 2:20 p.m. **Using Cytogenetics Data To Guide the Normalization of SNP Microarray Signals**—◆ Stanley Pounds, St. Jude Children's Research Hospital; Cheng Cheng, St. Jude Children's Research Hospital; Charles Mullighan, St. Jude Children's Research Hospital; Salil Goorha, St. Jude Children's Research Hospital; Sheila Shurtleff, St. Jude Children's Research Hospital; Susana C. Raimondi, St. Jude Children's Research Hospital; James R. Downing, St. Jude Children's Research Hospital
- 2:35 p.m. **Category Analysis for Microarray Data**—◆ Zhen Jiang, Fred Hutchinson Cancer Research Center; Robert Gentleman, Fred Hutchinson Cancer Research Center
- 2:50 p.m. **Probe-Level Modeling and Multiple Testing of Microarray Gene Expression**—◆ Tao Wang, University of South Florida; Magali Mouy, deCODE genetics; Jason Hsu, The Ohio State University; Hakon Hakonarson, deCODE genetics; Kari Stefansson, deCODE genetics
- 3:05 p.m. **Application of Temporal Association Rules to a cDNA Microarray Experiment**—◆ Bruce Southey, University of Illinois; Sandra Rodriguez-Zas, University of Illinois; Younhee Ko, University of Illinois; Chengxiang Zhai, University of Illinois

# Statistics Journals from Blackwell Publishing

## Published on behalf of the Royal Statistical Society



AVAILABLE ONLINE EARLY FROM 2005

### Journal of the Royal Statistical Society: Series A (Statistics in Society)

[www.blackwellpublishing.com/rssa](http://www.blackwellpublishing.com/rssa)



AVAILABLE ONLINE EARLY FROM 2005  
NOW 5 ISSUES PER YEAR

### Journal of the Royal Statistical Society: Series B (Statistical Methodology)

[www.blackwellpublishing.com/rssb](http://www.blackwellpublishing.com/rssb)



AVAILABLE ONLINE EARLY FROM 2005  
NOW 5 ISSUES PER YEAR

### Journal of the Royal Statistical Society: Series C (Applied Statistics)

[www.blackwellpublishing.com/rssc](http://www.blackwellpublishing.com/rssc)



### Significance

Statistics making sense

The magazine of the Royal Statistical Society  
[www.blackwellpublishing.com/sign](http://www.blackwellpublishing.com/sign)



### Australian & New Zealand Journal of Statistics

Published on behalf of the Statistical Society of Australia Inc. and the New Zealand Statistical Association  
[www.blackwellpublishing.com/anzs](http://www.blackwellpublishing.com/anzs)



### Biometrics: Journal of the International Biometric Society

Published on behalf of the International Biometric Society  
[www.blackwellpublishing.com/biom](http://www.blackwellpublishing.com/biom)



### Journal of Time Series Analysis

[www.blackwellpublishing.com/jtsa](http://www.blackwellpublishing.com/jtsa)



### Mathematical Finance An International Journal of Mathematics, Statistics and Financial Economics

[www.blackwellpublishing.com/mafi](http://www.blackwellpublishing.com/mafi)



### Oxford Bulletin of Economics & Statistics

Published on behalf of the Department of Economics, University of Oxford  
[www.blackwellpublishing.com/obes](http://www.blackwellpublishing.com/obes)



### Scandinavian Journal of Statistics

Published on behalf of the Danish Society for Theoretical Statistics, the Finnish Statistical Society, the Norwegian Statistical Society and the Swedish Statistical Association  
[www.blackwellpublishing.com/sjos](http://www.blackwellpublishing.com/sjos)



### Statistica Neerlandica

Published on behalf of the Netherlands Society for Statistics and Operations Research  
[www.blackwellpublishing.com/journals/stan](http://www.blackwellpublishing.com/journals/stan)



### Studies in Applied Mathematics

Published on behalf of the Massachusetts Institute of Technology  
[www.blackwellpublishing.com/sapm](http://www.blackwellpublishing.com/sapm)



### Teaching Statistics

Published on behalf of the Teaching Statistics Trust  
[www.blackwellpublishing.com/test](http://www.blackwellpublishing.com/test)

## Also of related interest

Econometrica: The Journal of the Econometric Society

The Econometrics Journal

Financial Markets: Institutions & Instruments

Risk Analysis: An International Journal

Risk Management & Insurance Review

Journal of Risk & Insurance

Sociological Methodology

For further details of our journals and statistics books visit

[www.blackwellpublishing.com](http://www.blackwellpublishing.com)



# GENERAL PROGRAM SCHEDULE

⊛ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

3:20 p.m. **Quantitative Association Rules Applied to the Analysis of cDNA Microarray Experiments**—  
◆ Younhee Ko, University of Illinois; Bruce Southey, University of Illinois; Chengxiang Zhai, University of Illinois; Sandra Rodriguez-Zas, University of Illinois

3:35 p.m. **Strategies for Genome-Wide Family-Based Association Analysis for the Study of Integrative Genomics**—◆ James Degnan, Harvard University; Jessica Su, Harvard University; Cliona Molony, Rosetta Inpharmatics LLC; Eric Schadt, Rosetta Inpharmatics LLC/Merck Research Laboratories; Benjamin Raby, Harvard University; Christoph Lange, Harvard School of Public Health

## 24 CC-2A ● Pharmacokinetics and Crossover Trials—Contributed

Biopharmaceutical Section, Biometrics Section, ENAR

*Chair(s): Jie Chen, Merck Research Laboratories*

- 2:05 p.m. **Assessing PK-AE Relationships Using Nonlinear Models**—◆ Haiyuan Zhu, Merck Research Laboratories
- 2:20 p.m. **Applications of Adapted Crossover Designs To Reduce Study Cost and Length in Phase I Clinical Trials**—◆ Fang Liu, Merck Research Laboratories
- 2:35 p.m. **Analysis of Replicated Crossover Designs for Average Bioequivalence**—◆ Donna Kowalski, Astellas Pharma Inc.; Devan V. Mehrotra, Merck Research Laboratories
- 2:50 p.m. **Assessing Treatment Differences Adjusted by Possible Carryover Effects in Crossover Clinical Trials**—◆ Ling Chen, U.S. Food and Drug Administration
- 3:05 p.m. **Factorial Crossover Designs with Fewer Periods and Fewer Subjects**—◆ Sourav Santra, Northern Illinois University
- 3:20 p.m. **Locally D-Optimal Designs for Pharmacokinetics Compartmental Models**—◆ Xin Fang, University of Illinois at Chicago
- 3:35 p.m. **The Hypothesis Testing behind Steady State Determination in Clinical Pharmacology Trials**—  
◆ Bingming Yi, Merck & Co., Inc.; Xun Chen, sanofi-aventis; Patrick Larson, Merck & Co., Inc.

## 25 CC-2B ● Multiple Trials and Multiple Endpoints—Contributed

Biopharmaceutical Section, Biometrics Section, ENAR

*Chair(s): Shuguang Huang, Eli Lilly and Company*

- 2:05 p.m. **Analysis of a Composite Endpoint with Missing Data in Components**—◆ Hui Quan, sanofi-aventis; Daowen Zhang, sanofi-aventis; Ji Zhang, sanofi-aventis; Laure Devlamynck, sanofi-aventis
- 2:20 p.m. **A Multivariate Median-Based Robust Procedure To Analyze Multiple Endpoints**—◆ Kao-Tai Tsai, Organon; Harji Patel, Georgia Southern University
- 2:35 p.m. **On O'Brien's OLS and GLS Tests for Multiple Endpoints**—◆ Sergei Leonov, GlaxoSmithKline; James Roger, GlaxoSmithKline; Nigel Dallow, GlaxoSmithKline
- 2:50 p.m. **Tree-Structured Gatekeeping Procedures in Clinical Trials with Multiple Objectives**—◆ Alex Dmitrienko, Eli Lilly and Company; Brian L. Wiens, Myogen, Inc.; Ajit C. Tamhane, Northwestern University; Xin Wang, Northwestern University
- 3:05 p.m. **Control of Overall Type I Error in Clinical Trials with Both Surrogate and Final Endpoints**—  
◆ Chung-Kuei Chang, Cephalon, Inc.
- 3:20 p.m. **Monitoring Futility in Two-by-Two Factorial Studies**—◆ Leslie A. McClure, The University of Alabama at Birmingham; Christopher S. Coffey, The University of Alabama at Birmingham; George Howard, The University of Alabama at Birmingham
- 3:35 p.m. **Floor Discussion**

## 26 CC-210 ● Mortgages and Auctions—Contributed

Business and Economics Statistics Section

*Chair(s): J. Keith Ord, Georgetown University*

- 2:05 p.m. **Loss and Prepayment Modeling in the Context of Subprime Mortgage Loans**—Deniz Senturk, GE Global Research; ◆ Huaiyu Ma, GE Global Research; Greg Ratkovsky, WMC
- 2:20 p.m. **Credit Rating Transition of U.S. Corporate Bonds**—◆ Weijian Liang, New York University; Halina Frydman, New York University; Stephen Figlewski, New York University

- 2:35 p.m. **Credit Risk Analysis for Taiwan Electronic Industrial**—❖ Yi-Kuan Jong, St. John's University
- 2:50 p.m. **Statistical Validation of a Credit Risk Model**—  
❖ Lydian Medema, University of Groningen
- 3:05 p.m. **A Semiparametric Investigation of the Effect of Reserve Prices on Selling Prices Using Identical Auctioned Items from eBay**—❖ Dawit Zerom, University of Alberta; Peter Popkowski Leszczyc, University of Alberta
- 3:20 p.m. **A Statistical Approach to Controlling Sniping in Electronic Auctions**—❖ Dawn Porter, Georgetown University; J. Keith Ord, Georgetown University
- 3:35 p.m. **A New Model for Forecasting Credit Spread Changes: Model Estimation, Prediction, and Inference Procedures**—❖ Yang Wang, The Pennsylvania State University

## 27 CC-213 Software—Contributed

Section on Statistical Computing

*Chair(s): Morteza Marzjarani, Saginaw Valley State University*

- 2:05 p.m. **The Carapace Environment**—❖ Gary Oehlert, University of Minnesota
- 2:20 p.m. **Enterprise Automaton with R**—❖ Zubin Dowlaty, InterContinental Hotels Group; Dean Mao, InterContinental Hotels Group; Simon Urbanek, AT&T Labs-Research
- 2:35 p.m. **Estimation and Inference in Parametric Stochastic Frontier Models: a SAS/IML Procedure for a Maximum Likelihood Bootstrap Method**—❖ Sylvie Tchumtchoua, University of Connecticut
- 2:50 p.m. **A New Program for Computing Percentage Points for Pearson Distributions**—❖ Wei Pan, University of Cincinnati; Haiyan Bai, University of Cincinnati
- 3:05 p.m. **Statistical Inference Package (SIP)**—❖ Esa Uusipaikka, University of Turku
- 3:20 p.m. **Floor Discussion**

## 28 CC-214 Testing—Contributed

Section on Statistical Computing

*Chair(s): Faming Liang, Texas A&M University*

- 2:05 p.m. **Testing the Equality of Two Normally Distributed Populations**—❖ Charles Dunn, Miami University

- 2:20 p.m. **Generation of the Distribution of the Test for a Latin Square Design with Heterogeneous Variances**—❖ Miin-Jye Wen, National Cheng Kung University; Hubert Chen, National Cheng Kung University
- 2:35 p.m. **On Testing the Bioequivalence of Several Treatments Using the Measure of Distance**—  
❖ Hubert Chen, National Cheng Kung University; Miin-Jye Wen, National Cheng Kung University
- 2:50 p.m. **An Exact Test for Testing the Equality of Parameter Matrices in Two Multivariate Linear Models**—❖ Jinadasa K. Gamage, Illinois State University; Malwane M. A. Ananda, University of Nevada, Las Vegas
- 3:05 p.m. **Performance of Robust and Nonrobust Roy-Bargmann Stepdown Follow-up to a Significant MANOVA under a Variety of Conditions: a Simulation Study**—❖ Holmes Finch, Ball State University
- 3:20 p.m. **Comparisons of Sets of Multivariate Time Series**—❖ Jaydip Mukhopadhyay, University of Connecticut; Nalini Ravishanker, University of Connecticut; Jonathan Hosking, IBM Research
- 3:35 p.m. **Iterated BH Procedure**—❖ Nasrine Bendjilali, Lehigh University; Wei-Min Huang, Lehigh University

## 29 CC-603 Likelihood-Based Inference—Contributed

IMS

*Chair(s): Siobhan Everson-Stewart, University of Washington*

- 2:05 p.m. **Testing of Rate Ratio under Inverse Sampling**—  
❖ Hon Keung T. Ng, Southern Methodist University; Man Lai Tang, Hong Kong Baptist University; Yijie Liao, Hong Kong Baptist University; Ping Shing Chan, The Chinese University of Hong Kong
- 2:20 p.m. **A Bivariate Interval Censorship Model for Partnership Formation**—❖ Qiqing Yu, Binghamton University; Linda Wong, Binghamton University
- 2:35 p.m. **The Likelihood Ratio Test of Mixture Hypotheses and the Tube Volume Problem**—❖ Yong Lin, University of Medicine & Dentistry of New Jersey; Bruce G. Lindsay, The Pennsylvania State University

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

2:50 p.m. **On Hinkley's Estimator: Inference about the Change-Point**—◆ Stergios B. Fotopoulos, Washington State University; Venkata Jandhyala, Washington State University

3:05 p.m. **Conditional Properties of a Parametric Bootstrap**—◆ Russell Zaretzki, University of Tennessee

3:20 p.m. **Summarizing and Interpreting Likelihood Functions as Functions**—◆ Michael Brimacombe, University of Medicine & Dentistry of New Jersey; Bo Peng, University of Medicine & Dentistry of New Jersey

3:35 p.m. **Testing for and against a Set of Linear Inequality Constraints in the Product Multinomial Setting**—◆ Hammou Elbarimi, Baruch College

## 30 CC-211 **Bayesian Biomedical Modeling—Contributed**

Section on Bayesian Statistical Science, Biometrics Section, WNAR, ENAR

*Chair(s): Edwin S. Iversen, Jr., Duke University*

2:05 p.m. **Monitoring Event Times in Early-Phase Clinical Trials: Practical Issues**—◆ Leiko H. Wooten, M. D. Anderson Cancer Center; Peter F. Thall, M. D. Anderson Cancer Center; Nizar M. Tannir, M. D. Anderson Cancer Center

2:20 p.m. **Modeling Long-Term HIV Dynamics: a Bayesian Approach**—◆ Dacheng Liu, Boehringer Ingelheim; Hulin Wu, University of Rochester; Yangxin Huang, University of South Florida

2:35 p.m. **Prior Structures for Surrogate Endpoint Validation Using PTE**—◆ Chunyao Feng, Baylor University; John W. Seaman, Baylor University; Stacy Lindborg, Eli Lilly and Company

2:50 p.m. **A Bayesian Multivariate PK/PD Model for Analyzing Cortisol Circadian Rhythm in a Depression Study**—◆ Niko Kaciroti, University of Michigan; Trivellore E. Raghunathan, University of Michigan; Delia Vazquez, University of Michigan

3:05 p.m. **Bayesian Modeling of Correlated Binary Data from the Cryotherapy for Retinopathy of Prematurity (CRYO-ROP) Study**—◆ Claudia Pedroza, The University of Texas School of Public Health; Betty Tung, The University of Texas School of Public Health

3:20 p.m. **Bayesian Analysis of Age-Adjusted Cancer Rates Using Joinpoint Regression Model**—◆ Ram Tiwari, National Institutes of Health; Pulak Ghosh, Georgia State University

3:35 p.m. **Bayesian Modeling of Noncompliance in Folic Acid Dosing Studies**—◆ Owen Devine, Centers for Disease Control and Prevention

## 31 CC-605 **Consumer Prices and Expenditures—Contributed**

Section on Government Statistics

*Chair(s): Alan R. Tupek, U.S. Census Bureau*

2:05 p.m. **A Micro-Level Latent Class Analysis of Underreporting on the Consumer Expenditure Survey**—◆ Brian Meekins, Bureau of Labor Statistics; Clyde Tucker, Bureau of Labor Statistics; Paul Biemer, RTI International

2:20 p.m. **The Use of Geocoding to Locate Outlets Outside of Sample Area Boundaries to Determine Significant Areas of Commerce**—◆ John Schilp, Bureau of Labor Statistics; Fred Marsh, III, Bureau of Labor Statistics

2:35 p.m. **Internet Portals and Outlet Selection Issues in the Consumer Price Index**—◆ Charles Mason, Bureau of Labor Statistics; Roberta Sangster, Bureau of Labor Statistics; Madeleine Saxton, Bureau of Labor Statistics

2:50 p.m. **A Spatial Analysis of Price Change in CPI Housing Index**—◆ William Larson, Bureau of Labor Statistics

3:05 p.m. **Comparison of Chained CPI-U and Regular CPI-U All-U.S. Indexes in the Housing Sector (2000–2004)**—◆ Owen Shoemaker, Bureau of Labor Statistics

3:20 p.m. **Comparison between Newly Proposed Response Rates and Current Response Rates for the TPOP Survey**—◆ Fred Marsh, III, Bureau of Labor Statistics

3:35 p.m. **Effect of Computer-Assisted Personal Interviews in the U.S. Consumer Expenditure Interview Survey**—◆ Moon Jung Cho, Bureau of Labor Statistics; Carolyn Pickering, Bureau of Labor Statistics

## 32 CC-612 **Applications for Modeling Health Survey Data—Contributed**

Section on Health Policy Statistics

*Chair(s): David Blough, University of Washington*

2:05 p.m. **Modeling of Longitudinal Polytomous Outcomes from Complex Survey Data**—◆ Punam Pahwa, University of Saskatchewan; Chandima

- 2:20 p.m. Karunanayake, University of Saskatchewan; Helen H. McDuffie, University of Saskatchewan  
**Statistical Modeling of Longitudinal Mental Distress among the National Population Health Survey Participants: Missing Data Analysis**—❖ Chandima Karunanayake, University of Saskatchewan; Punam Pahwa, University of Saskatchewan; Helen H. McDuffie, University of Saskatchewan
- 2:35 p.m. **A Two-Phase Model To Study the Health Care-Seeking Behaviors for Common Cold of People in Taiwan**—❖ Hsing-Yi Chang, National Health Research Institutes; Yu-Wen Wen, National Health Research Institutes
- 2:50 p.m. **Alcohol Disorders and Employment Stability: a Longitudinal Study**—❖ Richard Bryant, University of Missouri-Rolla; V. A. R. Samaranyake, University of Missouri-Rolla

- 3:05 p.m. **Significance Analysis of Physician Photo Identification Cards Trial**—❖ Ye-Ying Cen, Hennepin County Medical Center; Jennings Ryan Staley, United States Air Force; Baolin Wu, University of Minnesota; Scott F. Davies, Hennepin County Medical Center
- 3:20 p.m. **Development, Scaling, and Implementation of a Patient Satisfaction Inventory for Organ Transplant Candidates and Recipients**—❖ Irene Feurer, Vanderbilt University Medical Center; Hongxia Liu, Vanderbilt University School of Nursing; Panarut Wisawatapnimit, Vanderbilt University School of Nursing; C. Wright Pinson, Vanderbilt University Medical Center
- 3:35 p.m. **Factor Analysis with Categorical Data: a Methodological Illustration with the GAZA Child Health Survey Data**—❖ Dongguang Li, National Cancer Institute of Canada; John D. Pringle, Queen's University; Julio Arboleda-Florez, Queen's University; Heather Stuart, Queen's University

## Success is Certain.



ASG, Inc. is a niche provider of staffing services in the disciplines of: **SAS Programming, Biostatistics, Regulatory Affairs, Data Management and Clinical Research.** Your success will be certain when you work with us as an ASG contractor.

**Continue your path to success.**

Logon to our website for more information.

[www.asg-inc.com](http://www.asg-inc.com)



Attentive. Honest. Certain.



# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

## 33 CC-212 ● **Nonparametric Approaches to Regression and Spatial Modeling—Contributed**

Section on Nonparametric Statistics

*Chair(s): Huiping Jiang, Columbia University*

- 2:05 p.m. **Regression Model-Fitting with Long Memory—**  
◆ Hongwen Guo, Michigan State University;  
Hira L. Koul, Michigan State University
- 2:20 p.m. **Multivariate Theil-Sen Estimators—**◆ Xin  
Dang, University of Mississippi; Hanxiang Peng,  
University of Mississippi; Xueqin Wang, Yale  
University School of Medicine
- 2:35 p.m. **A Goodness-of-Fit Test for Parametric Regression  
Models When Some Covariates Are Missing—**  
◆ Lei Jin, Texas A&M University; Suojin Wang,  
Texas A&M University
- 2:50 p.m. **Estimating Prediction Error in Linear Regression  
by Cross-Validation—**◆ Hui Shen, The University  
of British Columbia; William J. Welch, The  
University of British Columbia
- 3:05 p.m. **On Nonparametric Smoothing Methods  
for Assessing Climate Change—**◆ Patricia  
Menendez Galvan, Swiss Federal Research  
Institute WSL/ETHZ; Sucharita Ghosh, Swiss  
Federal Research Institute WSL
- 3:20 p.m. **Evaluation of Spatial Normalization Parameters  
for SPM: Application to Type 2 Diabetes Data—**  
◆ Bedda Rosario, University of Pittsburgh; Scott  
Ziolko, University of Pittsburgh; Lisa Weissfeld,  
University of Pittsburgh; Julie Price, University of  
Pittsburgh
- 3:35 p.m. **Statistical Methods for Proportional Hazards  
Regression with Missing Covariates—**◆ Lihong Qi,  
University of California, Davis; Ching-Yun Wang,  
Fred Hutchinson Cancer Research Center; Ross  
Prentice, Fred Hutchinson Cancer Research Center

## 34 CC-601 ● **Optimal Experimental Design—Contributed**

Section on Physical and Engineering Sciences

*Chair(s): Cheryl Dingus, Battelle Memorial Institute*

- 2:05 p.m. **A Catalog of Nonisomorphic Indicator  
Functions—**◆ Shao-Wei Cheng, Academia  
Sinica; Chien-Yu Peng, Academia Sinica
- 2:20 p.m. **Certain Orthogonal Arrays with Generalized  
Minimum Aberration—**◆ Aijun Zhang,  
University of Michigan

- 2:35 p.m. **Optimal Fold-over Designs for Three-Level  
Fractional Factorial Designs—**◆ Hong Zhou,  
University of Memphis; Manohar L. Aggarwal,  
University of Memphis; Lih Yuan Deng,  
University of Memphis; Dennis K. J. Lin, The  
Pennsylvania State University
- 2:50 p.m. **(M,S)-Optimality in Selecting Factorial  
Designs—**◆ Xianggui Qu, Oakland University;  
Robert Kushler, Oakland University; Theophilus  
Ogunyemi, Oakland University
- 3:05 p.m. **Algorithms for Generating Experimental Designs  
for Irregularly Shaped Regions—**◆ Greg Piepel,  
Battelle-PNNL; Nam-Ky Nguyen, University of  
New England
- 3:20 p.m. **Orthogonal-Maximin Latin Hypercube Designs—**  
◆ Ying Hung, Georgia Institute of Technology;  
Roshan J. Vengazhiyil, Georgia Institute of  
Technology
- 3:35 p.m. **Optimal Design of an Ion Trapping Experiment—**  
◆ Kevin Coakley, National Institute of Standards  
and Technology

## 35 CC-611 ● ⊕ **Causal Models and Causal Effects— Contributed**

Section on Statistics in Epidemiology, Biometrics Section, ENAR

*Chair(s): Abdus Wahed, University of Pittsburgh*

- 2:05 p.m. **On Informative Detection Bias in Screening  
Studies—**◆ Arvid Sjölander, Karolinska  
Institutet; Juni Palmgren, Karolinska Institutet
- 2:20 p.m. **Estimating a Class of Causal Treatment Effect for  
Survival Data—**◆ Jing Ning, The Johns Hopkins  
University; Mei-Cheng Wang, The Johns  
Hopkins University; Zhiqiang Tan, The Johns  
Hopkins University
- 2:35 p.m. **Path Analysis for Ordinal Variables—**◆ Haihong  
Li, University of Florida; P. V. Rao, University of  
Florida
- 2:50 p.m. **Approaches to Obtaining Standard Errors for  
Parameter Estimates in Latent Class Analysis—**  
◆ David M. Thompson, The University of  
Oklahoma
- 3:05 p.m. **An Application of Multivariate Path Models  
and the Calculus of Coefficients to Describe  
Effects of Health Behaviors on the Metabolic  
Syndrome—**◆ Youngju Pak, University at Buffalo;  
Randy L. Carter, University at Buffalo



When it comes to prediction,



you can't afford to play around.

Making predictions can be tricky. Whether you're underwriting loans, looking for credit card fraud, or diagnosing patients, drawing conclusions from limited data is serious business. NeuralTools from Palisade brings sophisticated Neural Networks to Microsoft Excel, so you can use your known data to make predictions with uncanny accuracy. Plus, NeuralTools Live Prediction updates results in real-time, making it the tool of choice among professionals. Because anything else is just a toy.

**“Very Intuitive”**

“The software is very intuitive. In just an hour, I was able to complete a predictive analysis using my data.”

— Jim Webre, Drexel University

**“Logical and Fast”**

“I was impressed with the software – easy to use, logical and fast.”

— Eugene Fleming, Fleming and Associates



In North America:  
800 432 7475  
607 277 8000  
sales@palisade.com

In Europe:  
+44 1895 425050  
sales@palisade-europe.com

Download a FREE trial version of NeuralTools at <http://www.palisade.com/jsmNT>

Order NeuralTools Pro today and **SAVE \$400**  
when you mention this ad!

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC—Washington State Convention & Trade Center H—Grand Hyatt Seattle S—Sheraton Seattle Hotel & Towers

- 3:20 p.m. **Signed Directed Acyclic Graphs for Causal Inference**—◆ Tyler J. VanderWeele, Harvard School of Public Health; James Robins, Harvard School of Public Health

- 3:35 p.m. **Floor Discussion**

## 36 CC-608 ● **Unit Nonresponse in Surveys I—Contributed**

Section on Survey Research Methods

*Chair(s): Karol Krotki, RTI International*

- 2:05 p.m. **Nonresponse to a Computer-Assisted Self-Interviewing (CASI) Module**—◆ Mick Couper, University of Michigan; Eleanor Singer, University of Michigan; John Van Hoewyk, University of Michigan
- 2:20 p.m. **Assessing the Effectiveness of Weighting Cell Adjustments for Longitudinal Nonresponse**—◆ Leroy Bailey, U.S. Census Bureau
- 2:35 p.m. **Sample Reweighting To Reflect an Initial Population**—◆ Julia Bienias, Rush University Medical Center; Phillip S. Kott, National Agricultural Statistics Service; Todd L. Beck, Rush University Medical Center; Denis A. Evans, Rush University Medical Center
- 2:50 p.m. **Approaches to Nonresponse Bias Analysis in an Adult Literacy Survey**—◆ Wendy Van de Kerckhove, Westat; Thomas Krenzke, Westat; Leyla Mohadjer, Westat
- 3:05 p.m. **An Application of Propensity Modeling To Adjust Weights for Nonresponse: Effectiveness of Restricting Variables and Propensity Values**—◆ Frank Potter, Mathematica Policy Research, Inc.; Nuria Diaz-Tena, Mathematica Policy Research, Inc.; Stephen R. Williams, Mathematica Policy Research, Inc.
- 3:20 p.m. **Adjusting for Nonignorable Missing Data with Nonignorable Sampling Design in Longitudinal Sample Survey**—◆ Moh Yin Chang, University of Nebraska-Lincoln
- 3:35 p.m. **Estimated Response Propensities as a Means To Evaluate Error Effects Due to Nonresponse**—◆ Leela Aertker, The University of North Carolina at Chapel Hill; William D. Kalsbeek, The University of North Carolina at Chapel Hill

## 37 CC-610 ● **Estimation and Confidentiality—Contributed**

Section on Survey Research Methods, Section on Health Policy Statistics

*Chair(s): Andrew A. White, Institute of Education Sciences*

- 2:05 p.m. **Disclosure Avoidance for the 2007 ACS PUMS: a Model-Based Approach for Group-Quarters Data**—◆ Rolando Rodriguez, U.S. Census Bureau
- 2:20 p.m. **Reporting to Payers, Regulators, and Managers: Issues and Experiences with Confidentiality and Compliance**—◆ Richard Carlson, Medica
- 2:35 p.m. **The Change-of-Variance Function in Generalized Linear Mixed-Effect Models with Applications to Poisson-Gamma and Beta-Binomial Models**—◆ Gabriela Cohen-Freue, The University of British Columbia
- 2:50 p.m. **A Bridge between the Greg and the Linear Regression Estimators**—◆ Sarjinder Singh, St. Cloud State University; Raghunath Arnab, University of Botswana
- 3:05 p.m. **A Generalized Forced Quantitative Randomized Response Model**—◆ Oluseun Odumade, St. Cloud State University; Sarjinder Singh, St. Cloud State University
- 3:20 p.m. **Global and Hierarchical Linear Regression in Two-Stage Sampling**—◆ Dharendra Ghosh, Synectics for Management Decisions, Inc.; Andrew Vogt, Georgetown University
- 3:35 p.m. **Confidentiality in Survey Data: the Lack of Consistent Standards**—◆ M. Leeann Habte, University of California, Los Angeles; Hongjian Yu, University of California, Los Angeles; Jenny Chia, University of California, Los Angeles; Brandon Traudt, University of California, Los Angeles

---

## Special Presentation 4:00 p.m.–5:50 p.m.

---

## 38 CC-4C-4 **Introductory Overview Lectures: Adaptive Designs/Interim Pilots and Regression Trees—Other**

The ASA, ENAR, IMS, SPAIG Committee, WNAR

*Organizer(s): Lisa M. LaVange, The University of North Carolina at Chapel Hill*

*Chair(s): Lisa M. LaVange, The University of North Carolina at Chapel Hill*

- 4:05 p.m. **Regression Trees**—◆ Wei-Yin Loh, University of Wisconsin-Madison

- 4:55 p.m. **Adaptive and Internal Pilot Designs—**  
❖ Christopher S. Coffey, The University of  
Alabama at Birmingham

5:45 p.m. **Floor Discussion**

## Invited Sessions 4:00 p.m.–5:50 p.m.

### 39 CC-401 **Statistics in Biotechnology around the Puget Sound—Invited**

ASA, Puget Sound Chapter, Section on Statistical Graphics

*Organizer(s): Bruce Peterson, Terastat*

*Chair(s): Tim C. Hesterberg, Insightful Corporation*

- 4:05 p.m. **Reference Samples and Other Low-Level Choices  
for the Design and Analysis of Two-Color  
Microarray Experiments—**❖ Kathleen Kerr,  
University of Washington
- 4:35 p.m. **Graphs and Networks in Computational  
Biology—**❖ Robert Gentleman, Fred Hutchinson  
Cancer Research Center
- 5:05 p.m. **Statistical Methods for Integrating High-  
Dimensional Genotype, Molecular Profiling, and  
Clinical Data To Elucidate Human Disease—**  
❖ Eric Schadt, Rosetta Inpharmatics LLC/Merck  
Research Laboratories
- 5:35 p.m. **Floor Discussion**

### 40 CC-400 **Statistical Issues in Genetic Association Studies—Invited**

General Methodology, Biometrics Section, ENAR

*Organizer(s): Danyu Lin, The University of North Carolina at Chapel  
Hill*

*Chair(s): Daniel Schaid, Mayo Clinic College of Medicine*

- 4:05 p.m. **Family Studies in the Age of Association—**❖ Nan  
M. Laird, Harvard School of Public Health
- 4:30 p.m. **Hybrid Vigor: Family-Based and Population-  
Based Designs Can Work Together—**❖ Clarice R.  
Weinberg, National Institute of Environmental  
Health Sciences; David M. Umbach, National  
Institute of Environmental Health Sciences
- 4:55 p.m. **Analysis of Complex Pathways in Molecular  
Epidemiology—**❖ Duncan C. Thomas, University  
of Southern California
- 5:20 p.m. **Disc: David Clayton, University of Cambridge**
- 5:40 p.m. **Floor Discussion**

### 41 CC-203 **● ⊕ Statistical Effect Assessment of Environmental Exposure—Invited**

ENAR, Biometrics Section, WNAR, Section on Statistics and the Environment

*Organizer(s): Li-Shan Huang, University of Rochester*

*Chair(s): Christopher Cox, The Johns Hopkins University*

- 4:05 p.m. **Bayesian Models for Multiple Outcomes  
Nested within Domains—**❖ Sally W. Thurston,  
University of Rochester Medical Center; David  
Ruppert, Cornell University
- 4:30 p.m. **Analysis of Multivariate Longitudinal Data Using  
Structural Equation Models—**❖ Esben Budtz-  
Jorgensen, University of Copenhagen; Philippe  
Grandjean, Harvard University; Frodi Debes,  
University of Southern Denmark; Pal Weihe,  
Faroese Hospital System
- 4:55 p.m. **Double-Smoothing Local Linear Estimation  
in Partial Linear Models with Application to  
Environmental Health Data—**❖ Li-Shan Huang,  
University of Rochester; Christopher Cox, The  
Johns Hopkins University
- 5:20 p.m. **Synthesizing Data from Multiple Sources for  
Environmental Risk Assessment—**❖ Louise Ryan,  
Harvard School of Public Health
- 5:45 p.m. **Floor Discussion**

### 42 CC-610 **Graphical Models and Variational Methods— Invited**

IMS, Section on Bayesian Statistical Science

*Organizer(s): Martin Wainwright, University of California, Berkeley*

*Chair(s): Martin Wainwright, University of California, Berkeley*

- 4:05 p.m. **Variational Methods for Dirichlet Process  
Mixtures—**❖ David M. Blei, Princeton  
University; Michael I. Jordan, University of  
California, Berkeley
- 4:35 p.m. **Structured Prediction, Dual Extragradient, and  
Bregman Projections—**❖ Ben Taskar, University  
of California, Berkeley
- 5:05 p.m. **A Variational Inference Procedure Allowing  
Internal Structure for Overlapping Clusters and  
Deterministic Constraints—**❖ Christopher Meek,  
Microsoft Research; Dan Geiger, Technion-Israel  
Institute of Technology
- 5:35 p.m. **Floor Discussion**

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

## 43 CC-213 ● **Statistical Methods in HIV/AIDS Research—Invited**

Section on Statistics in Epidemiology, Biometrics Section, ENAR

*Organizer(s): Michael G. Hudgens, The University of North Carolina at Chapel Hill*

*Chair(s): Michael G. Hudgens, The University of North Carolina at Chapel Hill*

- 4:05 p.m. **Methods for Determining the Accuracy of Quantitative PCR for Low Levels of HIV-1—**  
◆ Barbra Richardson, University of Washington
- 4:25 p.m. **A Bernoulli/Left-Censored Lognormal Mixture Model for Activity of the Protease of HIV-1 as a Function of Amino Acid Characteristics—**◆ Paul W. Stewart, The University of North Carolina at Chapel Hill
- 4:45 p.m. **Evaluating Linked Substitutions in HIV Genomic Sequences—**◆ Françoise Seillier-Moiseiwitsch, Georgetown University Medical Center; Huwaida Rabie, Georgetown University Medical Center; Rebecca Slack, Georgetown University Medical Center; JaeHyung Ahn, The University of North Carolina at Chapel Hill; Gary Koch, The University of North Carolina at Chapel Hill
- 5:05 p.m. **A Comprehensive Mathematical Model of HIV/STD Spread in Communities—**◆ Georgiy V. Bobashev, RTI International; Michael Goedecke, RTI International; Elizabeth Costenbader, RTI International; William Zule, RTI International
- 5:25 p.m. Disc: Sarah Holte, Fred Hutchinson Cancer Research Center
- 5:45 p.m. **Floor Discussion**

## 44 CC-201 ● **Global Views on the Role of Statistics in Medical Device Regulation—Invited**

Biopharmaceutical Section, ENAR

*Organizer(s): Gene Pennello, U.S. Food and Drug Administration*

*Chair(s): Gene Pennello, U.S. Food and Drug Administration*

- 4:05 p.m. **Statistical Regulations in the EU: Do They Exist for Medical Devices?—**◆ Bart Gerritse, Medtronic, Inc.
- 4:30 p.m. **Statistics in the Chinese Regulatory Environment of Medical Devices—**◆ Li Wei, Cardiovascular Institute and Fu Wai Hospital; Yao Chen, Peking University First Hospital
- 4:55 p.m. **The Global Harmonization Task Force—**◆ Larry G. Kessler, U.S. Food and Drug Administration

5:20 p.m. Disc: Greg Campbell, U.S. Food and Drug Administration

5:40 p.m. **Floor Discussion**

## 45 CC-3A **Statistical Learning and Data Mining—Invited**

International Chinese Statistical Association, Section on Nonparametric Statistics

*Organizer(s): Xiaotong Shen, University of Minnesota*

*Chair(s): Xiao-Li Meng, Harvard University*

- 4:05 p.m. **Image Denoising via Solution Paths—**◆ Ji Zhu, University of Michigan; Li Wang, University of Michigan; Hui Zou, University of Minnesota
- 4:35 p.m. **Using Input-Dependent Weights for Model Combination and Model Selection with Multiple Sources of Data—**◆ Wei Pan, University of Minnesota; Guanghua Xiao, University of Minnesota; Xiaohong Huang, University of Minnesota
- 5:05 p.m. **Binning in Gaussian Kernel Regularization—**  
◆ Bin Yu, University of California, Berkeley; Tao Shi, University of California, Berkeley
- 5:35 p.m. **Floor Discussion**

## 46 CC-614 **Statistical Graphics: from Playfair to Bertin and beyond—Invited**

Section on Statistical Graphics, Section on Statistical Education

*Organizer(s): Michael Friendly, York University*

*Chair(s): Antony Unwin, Universität Augsburg*

- 4:05 p.m. **Graphics in French Statistical Journals during the 19th Century—**◆ Antoine de Falguerolles, University Paul Sabatier (Toulouse III)
- 4:35 p.m. **Andre-Michel Guerry and the Rise of Moral Statistics—**◆ Michael Friendly, York University
- 5:05 p.m. **William Playfair and the Psychology of Graphs—**  
◆ Ian Spence, University of Toronto
- 5:35 p.m. **Floor Discussion**

## 47 CC-210 ● **Statistical Methods in Oral Health Research—Invited**

Biometrics Section, WNAR

*Organizer(s): Elizabeth G. Hill, Medical University of South Carolina*

*Chair(s): Elizabeth H. Slate, Medical University of South Carolina*

- 4:05 p.m. **A Semiparametric Bayesian Model for Inter-Rater Agreement of Probing Pocket Depth—**



# Statistics from Wiley at JSM!



## Introduction to Linear Regression Analysis, 4th Edition

Douglas C. Montgomery, Elizabeth A. Peck, G. Geoffrey Vining

The Fourth Edition of *Introduction to Linear Regression Analysis* describes both the conventional and less common uses of linear regression in the practical context of today's mathematical and scientific research. This popular book

blends both theory and application to equip the reader with an understanding of the basic principles necessary to apply regression model-building techniques in a wide variety of application environments.

0-471-75495-1 • July 2006 • 640 pp. • Cloth • \$110.00



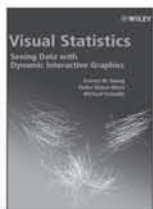
## Regression Analysis by Example, 4th Edition

Samprit Chatterjee, Ali S. Hadi

Carrying out a successful application of regression analysis requires a balance of theoretical results, empirical rules, and subjective judgment. *Regression Analysis by Example, Fourth Edition* explains the principles underlying exploratory data analysis, emphasizing data analysis rather than statistical theory. Completely rewritten, reorganized, and updated,

the new edition is expanded and modernized to reflect recent advances in the field, offering in-depth treatment of diagnostic plots, time series regression, multicollinearity, logistic regression, and robust regression and data mining.

0-471-74696-7 • September 2006 • 416 pp. • Cloth • \$105.00



## Visual Statistics:

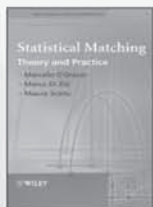
### Seeing Data with Dynamic Interactive Graphics

Forrest W. Young, Pedro M. Valero-Mora, Michael Friendly

Visual statistics accomplishes the goal of bringing the most complex and advanced statistical methods within the reach of those with little statistical training by using animated graphics of the data. This text shows how to make dynamic

visualizations that are fully interactive and respond instantly to the user's nudges and prods. The graphics are created from relevant mathematical statistics and the interactive presentation of dynamic graphics promotes perceptual and cognitive understanding of the data's story.

0-471-68160-1 • September 2006 • 448 pp. 8 Cloth • \$89.95

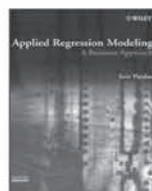


## Statistical Matching: Theory and Practice

Marcello D'Orazio, Marco Di Zio, Mauro Scanu

There is more statistical data produced in today's modern society than ever before. This data is analyzed and cross-referenced for innumerable reasons. However, many data sets have no shared element and are harder to combine and therefore obtain any meaningful inference from. Statistical matching allows just that; it is the art of combining information from different sources (particularly sample surveys) that contain no common unit. In response to modern influxes of data, it is an area of rapidly growing interest and complexity. *Statistical Matching: Theory and Practice* introduces the basics of statistical matching, before going on to offer a detailed, up-to-date overview of the methods used and an examination of their practical applications.

0-470-02353-8 • May 2006 • 268 pp. • Cloth • \$99.00

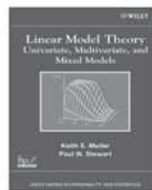


## Applied Regression Modeling: A Business Approach

Iain Pardoe

*Applied Regression Modeling: A Business Approach* represents a consciously fused effort to put all the building blocks of regression modeling in one place (with chapters on statistical foundations and simple linear regression), before constructing a general framework for building multiple linear regression models. The emphasis is on interesting and challenging applications that provide a unified fabric for business settings. An abundant use of graphics is employed throughout the book in an effort to keep the verbiage to an absolute minimum. SPSS, Excel, and R software discussions are incorporated.

0-471-97033-6 8 • August 2006 • 320 pp. • Cloth • \$99.95



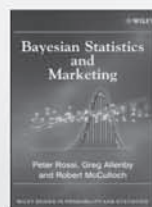
## Linear Model Theory:

### Univariate, Multivariate, and Mixed Models

Keith E. Muller, Paul W. Stewart

*Fundamentals of Multivariate Linear Models: Theory and Application* consists of five parts. Part 1 centers on brief, clear mathematical statements of notation, assumptions, and formulas. Real data examples illustrate and motivate students. Part 2 consists of mathematical prerequisites (matrix algebra and the fundamentals of multivariate statistical theory) and is based on the assumption that some students either have not learned this material already or will need to review it. Part 3 contains chapters on the multivariate Gaussian distribution and quadratic forms. Part 4 focuses on estimation and inference. Part 5 concentrates on study planning. Each section of the book contains homework assignments and exams that instructors may use for their classes, or that students can use to test their own knowledge

0-471-21488-4 • July 2006 • 480 pp. • Cloth • \$84.95



## Bayesian Statistics and Marketing

Peter Rossi, Greg Allenby, Rob McCulloch

*Bayesian Statistics and Marketing* describes the basic advantages of the Bayesian approach, detailing the nature of the computational revolution. Examples contained include household and consumer panel data on product purchases and survey data, demand models based on micro-economic theory and random effect models used to pool data among respondents. The book also discusses the theory and practical use of MCMC methods.

0-470-86367-6 • January 2006 • 368 pp. • Cloth • \$79.95

## TO ORDER:

1-877-762-2974 North America

+ 44 (0) 1243 779 777 in Rest of World

Log on to [www.wiley.com](http://www.wiley.com)

Save 20% on all Wiley Statistics titles at JSM, or use promotion code JS806 at checkout when you order online.

For more titles, visit us at Booth 424.

First 1000 visitors get a special gift.

 **WILEY**  
Publishers Since 1807





# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ❖ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

❖ Elizabeth G. Hill, Medical University of South Carolina; Elizabeth H. Slate, Medical University of South Carolina

- 4:30 p.m. **Ensemble Models for Risk Prediction with Survey and Multilevel Data**—❖ Stuart A. Gansky, University of California, San Francisco; Nancy F. Cheng, University of California, San Francisco
- 4:55 p.m. **Spatial Analyses of Periodontal Data Using Conditionally Autoregressive Priors Having Two Classes of Neighbor Relations**—❖ Brian Reich, North Carolina State University; James Hodges, University of Minnesota; Bradley P. Carlin, University of Minnesota
- 5:20 p.m. Disc: Julie Stoner, University of Nebraska Medical Center
- 5:40 p.m. **Floor Discussion**

## Invited Panels 4:00 p.m.–5:50 p.m.

### 48 CC-617

#### ● ⊕ Minorities, Environment, and Statistics—Invited

Committee on Minorities in Statistics, Section on Statistical Education

*Organizer(s): Nagambal Shah, Spelman College*

*Chair(s): Calvin L. Williams, Clemson University*

- Panelists:** ❖ Nagambal Shah, Spelman College
- ❖ William Hunt, North Carolina State University
- ❖ Julia Bader, The University of Texas at El Paso
- ❖ Kishi Animashaun Ducre, Syracuse University

5:45 p.m. **Floor Discussion**

### 49 CC-3B

#### ● ⊕ 'Bad' Statistical Methods: What Are the Costs?—Invited

The American Statistician, Section on Statistical Education, Section on Statistical Consulting, Section on Teaching Statistics in the Health Sciences

*Organizer(s): Peter Westfall, Texas Tech University*

*Chair(s): Peter Westfall, Texas Tech University*

- Panelists:** ❖ David Freedman, University of California, Berkeley
- ❖ S. Stanley Young, National Institute of Statistical Sciences
- ❖ Mary Foulkes, U.S. Food and Drug Administration
- ❖ Juliet Shaffer, University of California, Berkeley

5:45 p.m. **Floor Discussion**

## Topic-Contributed Sessions

4:00 p.m.–5:50 p.m.

### 50 CC-204

#### ● Strengths and Weaknesses of a Megatrial—Topic-Contributed

Biopharmaceutical Section, Biometrics Section, ENAR

*Organizer(s): Vipin Arora, Novartis Pharmaceuticals Corporation;*

*Tsushung A. Hua, Novartis Pharmaceuticals Corporation*

*Chair(s): John E. Connett, University of Minnesota*

- 4:05 p.m. **Megatrials: Not Necessarily Either/Or**—❖ Lloyd Fisher, University of Washington
- 4:25 p.m. **Issues in the Use of a Composite Endpoint in Megatrials**—❖ Steven Snapinn, Amgen Inc.
- 4:45 p.m. **Are Megatrials Worth It?**—❖ Barry Davis, The University of Texas School of Public Health
- 5:05 p.m. **Strengths and Weaknesses of a Megatrial: Complexity of Designing, Handling, and Implementing Megatrials**—❖ Timothy Church, University of Minnesota
- 5:25 p.m. Disc: Patrick O'Meara, Pat O'Meara Associates, Inc.
- 5:45 p.m. **Floor Discussion**

### 51 CC-613

#### ● ⊕ Issues with Open Source Statistical Software in Industry: Validation, Legal Issues, and Regulatory Requirements—Topic-Contributed

Section on Statistical Computing, Biopharmaceutical Section, Section on Statistical Consulting, Section on Statistical Graphics

*Organizer(s): Nicholas J. I.Lewin-Koh, Eli Lilly and Company*

*Chair(s): Stacy Lindborg, Eli Lilly and Company*

- 4:05 p.m. **Open-Source Software and Pharma Development: Computer Systems Validation and Value**—❖ Anthony Rossini, Novartis Pharma AG
- 4:25 p.m. **Open-Source Software in Pharmaceutical Discovery**—❖ Gregory Warnes, Pfizer Inc.; A. Max Kuhn, Pfizer Global Research & Development; James Rogers, Pfizer Global Research & Development
- 4:45 p.m. **Use of Open-Source Software by an Academic Center in a Regulatory Environment**—❖ Thomas D. Cook, University of Wisconsin-Madison
- 5:05 p.m. **Times R A'changin': FDA Perspectives on Use of Open Source**—❖ B. Sue Bell, U.S. Food and



*turning knowledge into practice*

RTI International is the nation's second largest independent nonprofit research organization and is dedicated to conducting research and development that improves the human condition by turning knowledge into practice. With a staff of more than 2,500, RTI offers innovative research and technical solutions to governments and businesses worldwide in the areas of health and pharmaceuticals, advanced technology, governance, surveys and statistics, education and training, economic and social development, energy, and the environment. For more information, visit [www.rti.org](http://www.rti.org).



For more information,  
please contact:

Sally C. Morton, Ph.D.  
Vice President  
Statistics and Epidemiology  
RTI International  
phone: 919-316-3423  
e-mail: [morton@rti.org](mailto:morton@rti.org)

P.O. Box 12194  
3040 Cornwallis Rd.  
Research Triangle Park, NC  
27709-2194

SUDAAN® is a registered trademark of Research Triangle Institute. RTI International is a trade name of Research Triangle Institute.

All brand names and product names used are trademarks, registered trademarks, or trade names of their respective holders. The following terms are trademarks or registered trademarks of other organizations: Microsoft Windows is a registered trademark of Microsoft Corporation. Solaris is a trademark of Sun Microsystems. SAS is a registered trademark of the SAS Institute, Inc. SPSS is a registered trademark of SPSS, Inc.

## Statistical and Epidemiological Research

RTI International's Statistics and Epidemiology divisions have combined forces in 2006 to form one of the largest and most comprehensive statistical departments in private industry. We have over 230 professional staff in our new division and our goal is to provide sound, statistically defensible research through innovation, teamwork and technical expertise. We offer:

- Industry-leading methods in survey design and management, research computing, sample design, and statistical analysis
- Data warehousing and research analysis, including genomics and health care informatics
- Expertise in information capture, processing, analysis, and dissemination, including new techniques to address data disclosure avoidance
- International expertise in health, governance, and education
- Domain expertise in health, health security, economic and social development, education and training, and natural resources and the environment.

## SUDAAN 9

RTI's internationally recognized SUDAAN statistical software package provides descriptive and modeling procedures for analyzing data collected from finite populations (e.g. survey data) and other cluster-correlated data encountered in epidemiological studies, clinical trials, experimental studies, and longitudinal studies. SUDAAN is an essential addition to your software library and a useful complement to SAS and SPSS.

- SAS-Callable and Standalone versions of SUDAAN are available for Windows, Sun Solaris, Linux and DOS platforms. SAS-Callable allows procedures to work seamlessly within users' current SAS programs.
- New in 2006: SAS-callable SUDAAN (SAS Version 9) for Sun Solaris, 64 bit operating systems.
- Permanent and annual renewable licenses and short-term, fixed licenses (60 days and 4 months).
- SUDAAN Training: a 3-day Descriptive Procedure Course and a 3-day SUDAAN Modeling Procedures Course. 2006 training courses in Research Triangle Park, NC; Washington, DC; Los Angeles, CA; and Chicago, IL.
- Manuals at a reduced rate (ASA members receive an additional 10% off by using this promotional code: AMSTAT6).
- Consulting services available for statistical and epidemiological research and complex quantitative programming.

Additional information about SUDAAN, SUDAAN Training and our Statistical Consulting Program can be found at [www.rti.org/sudaan](http://www.rti.org/sudaan) or by calling 919-541-6602.

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

Drug Administration; Kathleen Morrish, U.S. Food and Drug Administration; Ferrin Harrison, U.S. Food and Drug Administration; David Petullo, U.S. Food and Drug Administration; Laura Thompson, U.S. Food and Drug Administration; Gerry W. Gray, U.S. Food and Drug Administration

5:25 p.m. **Software and Code Evaluation: Risk-Based Approaches to Software Integration**—◆Nicholas J. I. Lewin-Koh, Eli Lilly and Company; Robert A. Myers, Eli Lilly and Company

5:45 p.m. **Floor Discussion**

## 52 CC-602 **Model-Based Seasonal Adjustment: Algorithms and Applications—Topic-Contributed**

Business and Economics Statistics Section

*Organizer(s): Brian C. Monsell, U.S. Census Bureau*

*Chair(s): Tucker S. McElroy, U.S. Census Bureau*

4:05 p.m. **Numerical Implementation of Kalman Filter/ Smoother for State Space Models with Partially Diffuse Initial Conditions**—◆Rajesh Selukar, SAS Institute, Inc.

4:25 p.m. **Evaluation of Finite-Sample Diagnostics for Model-Based Seasonal Adjustments and Trends**—◆David Findley, U.S. Census Bureau; Richard Gagnon, U.S. Census Bureau; Tucker S. McElroy, U.S. Census Bureau

4:45 p.m. **Aspects of Model Averaging for Seasonal Adjustment**—◆John Aston, Academia Sinica

5:05 p.m. **Assessing Spectral Peaks in Economic Time Series**—◆Thomas D. Evans, Bureau of Labor Statistics; Stuart Scott, Bureau of Labor Statistics; Scott Holan, University of Missouri-Columbia; Tucker S. McElroy, U.S. Census Bureau

5:25 p.m. **Floor Discussion**

## 53 CC-615 **● From Sharks to Salmon: Quantitative Tools in Marine Demography and Management for Puget Sound and Alaska Fisheries—Topic-Contributed**

Section on Statistics and the Environment

*Organizer(s): Loveday Conquest, University of Washington*

*Chair(s): Loveday Conquest, University of Washington*

4:05 p.m. **The Management Strategy Evaluation Approach and the Gulf of Alaska Walleye Pollock Fishery—**

◆Teresa A'mar, University of Washington; Andre E. Punt, University of Washington; Martin W. Dorn, National Oceanic & Atmospheric Administration

4:25 p.m. **Using Mixture Models To Estimate Abundance of Patchy Species**—◆Elizabeth Conners, National Oceanic & Atmospheric Administration

4:45 p.m. **Forecasts of Salmon Returns**—◆Saang-Yoon Hyun, Columbia River Inter-Tribal Fish Commission; David H. Salinger, University of Washington

5:05 p.m. **Using Multivariate Statistics To Resolve Issues of Scale with Salmon Survival and Ocean Environmental Data**—◆Rishi Sharma, University of Washington

5:25 p.m. **Reconciling Biological Realities with Statistical Requirements in Fitting Growth Curves with Emphasis on Growth Models for Sharks**—◆Nicole Vega, University of Washington; Vincent Gallucci, University of Washington

5:45 p.m. **Floor Discussion**

## 54 CC-620 **● ⊕ Overview and Results from the 2005 National Census Test—Topic-Contributed**

Section on Survey Research Methods

*Organizer(s): Jennifer Tancreto, U.S. Census Bureau*

*Chair(s): James Treat, U.S. Census Bureau*

4:05 p.m. **An Overview of the 2005 National Census Test**—◆Jennifer Tancreto, U.S. Census Bureau

4:25 p.m. **Effect of Internet Response Mode Designs on Data Quality and Ease of Use**—◆Kelly Allmang, U.S. Census Bureau; Kevin Zajac, U.S. Census Bureau

4:45 p.m. **Experimental Treatment Results of the Bilingual Census Form from the 2005 National Census Test**—◆Julie Bouffard, U.S. Census Bureau; Jennifer Tancreto, U.S. Census Bureau

5:05 p.m. **Analysis of Self-Response Options and Respondent-Friendly Design from the 2005 National Census Test**—◆Michael Bentley, U.S. Census Bureau

5:25 p.m. **Experimental Treatment Results for the Age, Relationship, and Tenure Items from the 2005 National Census Test**—◆Joan Hill, U.S. Census Bureau; Jennifer Tancreto, U.S. Census Bureau; Cynthia A. Rothhaas, U.S. Census Bureau

5:45 p.m. **Floor Discussion**



**55** **CC-611**  
**● Statistical Issues in Veterans Administration (VA) Health Services Research—Topic-Contributed**

Section on Health Policy Statistics

*Organizer(s): Roslyn A. Stone, Veteran's Affairs Pittsburgh Healthcare System*

*Chair(s): Xiao-Hua Andrew Zhou, University of Washington*

**4:05 p.m. Statistical Issues in Racial/Ethnic Disparities Research**—✦ Roslyn A. Stone, Veteran's Affairs Pittsburgh Healthcare System; Huanyu Chen, VA Pittsburgh Healthcare System; Xiangyan Xu, Veteran's Affairs Pittsburgh Healthcare System

**4:25 p.m. The Use of Hierarchical Linear Models To Evaluate Methods for the Delivery of Primary Care**—✦ Martin Lee, University of California, Los Angeles

**4:45 p.m. Understanding Variation in Patient Safety Measures in the VA: How Bayesian Methods Can Help**—✦ Cindy Christiansen, Boston University

**5:05 p.m. A Decision-Theoretic Approach to Identifying Future High-Cost Patients**—✦ Kenneth Pietz, U.S. Department of Veterans Affairs; Margaret

M. Byrne, University of Miami; Laura A. Petersen, U.S. Department of Veterans Affairs  
**5:25 p.m. Disc:** Stephan Fihn, University of Washington School of Public Health

**5:45 p.m. Floor Discussion**

**56** **CC-604**  
**● ⊕ Bayesian Student Paper Competition I—Topic-Contributed**

Section on Bayesian Statistical Science

*Organizer(s): Steven N. MacEachern, The Ohio State University*

*Chair(s): Merlise Clyde, Duke University*

**4:05 p.m. Bayesian Synthesis**—✦ Qingzhao Yu, The Ohio State University; Steven N. MacEachern, The Ohio State University; Mario Peruggia, The Ohio State University

**4:25 p.m. A Bayesian Framework To Combine Multivariate Spatial Data and Physical Models for Hurricane Surface Wind Prediction**—✦ Kristen M. Foley, North Carolina State University; Montserrat Fuentes, North Carolina State University

**FREE GAUSS TRAINING**  
For times, stop by booth 233

## THE NEED FOR SPEED

**GAUSS™ Advanced Mathematical and Statistical System**

Econometrics

Simulation

Finance

Statistics

Engineering

N-Dimensional Arrays | Data Structures  
 Long Period Random Number Generators  
 Debugger with Float-over Watch

Flexibility

Fast Execution

Rapid Development

Large Data Sets

Power and Versatility

The Power for Complex  
Mathematical Computation

Program the way you think.

The Speed and Versatility  
for Production Applications

Optimization    Constrained Optimization/NLP    Linear Programming    Simulation    Quadratic Programming

Aptech Systems, Inc. • [www.Aptech.com](http://www.Aptech.com) • [info@Aptech.com](mailto:info@Aptech.com) • 425.432.7855

# GENERAL PROGRAM SCHEDULE

⊛ Themed Session ● Applied Session ❖ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

4:45 p.m. **A Bayesian Pooled Analysis of Doubly Censored HIV Data Using the Hierarchical Cox Model—**  
❖ Wei Zhang, Boehringer Ingelheim; Kathryn Chaloner, The University of Iowa; Ying Zhang, The University of Iowa; Mary K. Cowles, The University of Iowa

5:05 p.m. **An Adaptive Bayesian Approach to Jointly Modeling Response and Toxicity in Phase I Dose-Finding Trials—**❖ Meihua Wang, University of Pittsburgh; Roger Day, University of Pittsburgh

5:25 p.m. **Hierarchical State-Space Model for Microarray Short Time Course Experiments—**❖ Haiyan Wu, Emory University; Ming Yuan, Georgia Institute of Technology; Susan Kaech, Yale University; M. Elizabeth Halloran, Fred Hutchinson Cancer Research Center

5:45 p.m. **Floor Discussion**

## 57 CC-612 ● **Student Paper Competition Award Presentations—Topic-Contributed**

Section on Government Statistics, Section on Survey Research Methods, Social Statistics Section

*Organizer(s): Michael P. Cohen, Bureau of Transportation Statistics*

*Chair(s): Michael P. Cohen, Bureau of Transportation Statistics*

4:05 p.m. **Robust Model-Based Predictor of Finite Population Total—**❖ Yan Li, University of Maryland; Partha Lahiri, University of Maryland

4:25 p.m. **Causal Inference Based on Directed Acyclic Graphical Models and the Randomization Distribution: a Probability-Sampling Approach—**  
❖ Joel E. Hanson, University of California, Berkeley

4:45 p.m. **Small-Area Estimation for Business Surveys—**  
❖ Hukum Chandra, University of Southampton

5:05 p.m. **An Application of Parametric Bootstrap Method in Small-Area Estimation Problem—**❖ Huilin Li, University of Maryland

5:25 p.m. **Local Polynomial Regression for Small-Area Estimation—**❖ Pushpal Mukhopadhyay, Iowa State University; Tapabrata Maiti, Iowa State University

5:45 p.m. **Floor Discussion**

## Topic-Contributed Panels 4:00 p.m.–5:50 p.m.

### 58 CC-608 ● ⊛ **Going beyond the Law: Ethical Aspects of Privacy in Surveys—Topic-Contributed**

Social Statistics Section

*Organizer(s): Gerald Gates, U.S. Census Bureau*

*Chair(s): Virginia A. de Wolf, Consultant*

**Panelists:** ❖ Gerald Gates, U.S. Census Bureau  
❖ Pamela White, Statistics Canada  
❖ Jeffery Rodamar, U.S. Department of Education

5:45 p.m. **Floor Discussion**

### 59 CC-609 ● **How Is the TI-83 Calculator Changing How We Teach the Introductory Course in Statistics? Or Is It?—Topic-Contributed**

Section on Statistical Education

*Organizer(s): Marjorie Bond, Monmouth College*

*Chair(s): Marjorie Bond, Monmouth College*

**Panelists:** ❖ Dexter Whittinghill, Rowan University  
❖ Christopher Mecklin, Murray State University  
❖ Carolyn P. Dobler, Gustavus Adolphus College  
❖ Madhuri Mulekar, University of South Alabama

5:45 p.m. **Floor Discussion**

### 60 CC-607 ● **The Nontechnical Side of Statistical Consulting: Reflections on Careers as Working Statisticians and Suggestions and Guidance for Those on the Way—Topic-Contributed**

Section on Statistical Consulting, Section on Statistical Education

*Organizer(s): John Bartko, Retired*

*Chair(s): Edward D. Rothman, University of Michigan*

**Panelists:** ❖ John Bartko, Retired  
❖ Thomas Boardman, Colorado State University  
❖ Ross Prentice, Fred Hutchinson Cancer Research Center  
❖ Gerald van Belle, University of Washington

5:45 p.m. **Floor Discussion**



## 61 CC-211 Statistical Aspects of Pharmaceutical Industry Proof-of-Concept Studies—Topic-Contributed

Biopharmaceutical Section

*Organizer(s): Alfred Balch, Novartis Pharmaceuticals Corporation*

*Chair(s): Joga Gobburu, U.S. Food and Drug Administration*

- Panelists:**
- ❖ Surya Mohanty, Johnson & Johnson Pharmaceutical R&D
  - ❖ Glen Laird, Novartis Pharmaceuticals Corporation
  - ❖ Alfred Balch, Novartis Pharmaceuticals Corporation
  - ❖ Jens Praestgaard, Novartis Pharmaceuticals Corporation

5:45 p.m. **Floor Discussion**

---

## Regular Contributed Sessions 4:00 p.m.–5:50 p.m.

---

## 62 CC-205 ● Measuring Gene Expression—Contributed

Biometrics Section, WNAR, ENAR

*Chair(s): Saonli Basu, University of Minnesota*

- 4:05 p.m. **Clustering of Time-Course Gene Expression Data Using Functional Data Analysis**—❖ Joon Jin Song, University of Arkansas; Ho-Jin Lee, Schering-Plough Corporation; Jeffrey S. Morris, M. D. Anderson Cancer Center; Sanghoon Kang, Oak Ridge National Laboratory
- 4:20 p.m. **Dynamic Network Analysis of Time-Course Gene Expression Data**—❖ Donatello Telesca, University of Washington; Lurdes Y. T. Inoue, University of Washington
- 4:35 p.m. **A Bayes Approach to Virus Gene Time Course Expression Data**—❖ I-shou Chang, National Health Research Institutes
- 4:50 p.m. **Comparing Distance Measures for Clustering Time-Course Microarray Data**—❖ Theresa Scharl, Vienna University of Technology; Friedrich Leisch, University of Munich
- 5:05 p.m. **Bayesian Markov Chain Monte Carlo and Restricted Maximum Likelihood Study of Gene Expression Patterns across Time**—❖ Feng Hong, University of Illinois; Sandra Rodriguez-Zas, University of Illinois

5:20 p.m. **Semiparametric Analysis of Gene Expression Patterns across Ages**—❖ Sandra Rodriguez-Zas, University of Illinois; Bruce Southey, University of Illinois; Gene Robinson, University of Illinois

5:35 p.m. **Connectivity, Module-Conformity, and Significance: Understanding Gene Coexpression Network Methods**—❖ Jun Dong, University of California, Los Angeles; Steve Horvath, University of California, Los Angeles; Andy Yip, National University of Singapore

## 63 CC-206 ● Advances in Analyzing fMRI Studies—Contributed

Biometrics Section, ENAR

*Chair(s): Ciprian M. Crainiceanu, The Johns Hopkins University*

- 4:05 p.m. **Intrinsic Voxel Correlation in fMRI**—❖ Daniel Rowe, Medical College of Wisconsin; Raymond G. Hoffmann, Medical College of Wisconsin
- 4:20 p.m. **Robust Independent Component Analysis in fMRI**—❖ Ping Bai, The University of North Carolina at Chapel Hill; Young Truong, The University of North Carolina at Chapel Hill
- 4:35 p.m. **A Semiparametric Approach To Estimate the Family-Wise Error Rate in fMRI Using Resting-State Data**—❖ Rajesh Nandy, University of California, Los Angeles
- 4:50 p.m. **Spatio-Temporal Modeling of Functional Magnetic Resonance Imaging Data**—❖ Qihua Lin, Southern Methodist University; Patrick S. Carmack, The University of Texas Southwestern Medical Center at Dallas; Richard F. Gunst, Southern Methodist University; William R. Schucany, Southern Methodist University; Jeffrey S. Spence, The University of Texas Southwestern Medical Center at Dallas
- 5:05 p.m. **Interpreting Experience-Based Cognition from fMRI**—❖ Rajan Patel, Rice University; F. DuBois Bowman, Emory University; Ying Guo, Emory University; Gordana Derado, Emory University; Lance Waller, Emory University; Amita K. Manatunga, Emory University
- 5:20 p.m. **Detecting Cerebral Activation from Functional Magnetic Resonance Imaging Data**—❖ William Baumann, Iowa State University; Ranjan Maitra, Iowa State University
- 5:35 p.m. **Floor Discussion**

# GENERAL PROGRAM SCHEDULE

⊛ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

## 64 CC-214 ● ⊛ **Methodological Issues in Genetics Studies—Contributed**

Section on Statistics in Epidemiology, Biometrics Section, ENAR

*Chair(s): Bryan Langholz, Keck School of Medicine of USC*

- 4:05 p.m. **An Importance Sampling Procedure for Obtaining Confidence Intervals of Disease Loci with General Pedigree Data**—◆ Shuyan Wan, The Ohio State University; Shili Lin, The Ohio State University
- 4:20 p.m. **Correcting for Measurement Errors in Structured Association Tests**—◆ Jasmin Divers, The University of Alabama at Birmingham; Laura K. Vaughan, The University of Alabama at Birmingham; David Redden, The University of Alabama at Birmingham; Jose R. Fernandez, The University of Alabama at Birmingham; David B. Allison, The University of Alabama at Birmingham
- 4:35 p.m. **Genomic Control for Association Studies When the Genetic Model Is Unknown**—◆ Gang Zheng, National Heart, Lung, and Blood Institute; Boris Freidlin, National Cancer Institute; Joseph Gastwirth, The George Washington University
- 4:50 p.m. **Pedigree Disequilibrium Test for X-Chromosome Markers**—◆ Jie Ding, The Ohio State University; Shili Lin, The Ohio State University
- 5:05 p.m. **Incorporating Endophenotypes into Allelic Association Studies**—◆ Chao Hsiung, National Health Research Institutes
- 5:20 p.m. **Allowing for Etiologic Heterogeneity by Disease Subtype Increases the Power of Tests for Genetic Association**—◆ Peter Kraft, Harvard University; Sholom Wacholder, National Cancer Institute; Nilanjan Chatterjee, National Cancer Institute
- 5:35 p.m. **A Multiple Test Procedure Controlling Type I Error for Genome Scan Association Studies Using HapMap Data**—◆ Renfang Jiang, Michigan Technological University; Jianping Dong, Michigan Technological University; Shuanglin Zhang, Michigan Technological University; Qiuying Sha, Michigan Technological University

## 65 CC-619 ● **Sample Survey Design I—Contributed**

Section on Survey Research Methods

*Chair(s): Soma Roy, The Ohio State University*

- 4:05 p.m. **Model-Based Sampling Designs for Optimum Estimation**—◆ Sun Woong Kim, Dongguk

University; Steven G. Heeringa, University of Michigan; Peter W. Solenberger, University of Michigan

- 4:20 p.m. **Optimum Allocation in Two-Stage and Stratified Two-Stage Sampling for Multivariate Surveys**—◆ M. G. M. Khan, The University of the South Pacific; Munish A. Chand, The University of the South Pacific
- 4:35 p.m. **An Application of Genetic Algorithms to Multivariate Optimal Allocation in Stratified Sample Designs**—◆ Charles Day, U.S. Internal Revenue Service
- 4:50 p.m. **The Effect of the Number Eligible and Number Selected within Households on Reported Income and Other Socioeconomic Characteristics in the 2004 NSDUH**—◆ Tania Robbins, RTI International
- 5:05 p.m. **NASS/USDA Area Frame Sample Allocation for Estimation of Number of Farms Not on the Ag Census Mailing List**—◆ Floyd Spears, Harding University; Raj S. Chhikara, University of Houston-Clear Lake; Charles R. Perry, National Agricultural Statistics Service; Phillip S. Kott, National Agricultural Statistics Service
- 5:20 p.m. **Simple Power Calculations: How Do We Know We Are Doing It the Right Way?**—◆ Michael Vorburger, RTI International
- 5:35 p.m. **Estimation in Network Populations**—◆ Mike Kwanisai, National Opinion Research Center

## 66 CC-618 ● **Sample Survey Quality I—Contributed**

Section on Survey Research Methods

*Chair(s): Michael P. Battaglia, Abt Associates Inc.*

- 4:05 p.m. **Nonresponse Bias Studies: 2003–2004 School and Staffing Survey**—◆ Robyn Sirkis, U.S. Census Bureau; Bac Tran, U.S. Census Bureau; Phyllis Singer, U.S. Census Bureau
- 4:20 p.m. **Call Efforts and Relational Estimates: Preliminary Findings**—◆ Chung-tung Lin, U.S. Food and Drug Administration
- 4:35 p.m. **Estimation of Low Incidence Rates under Selection Bias**—◆ Bin Wang, University of South Alabama; Jiayang Sun, Case Western Reserve University
- 4:50 p.m. **Assessment of Diagnostic Tests in the Presence of Verification Bias Using Multiple Imputation and Resampling Methods**—◆ Michael P. McDermott, University of Rochester Medical

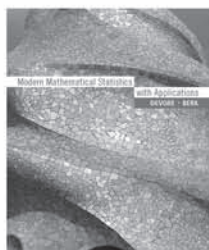
# DUXBURY

Visit our booth to see our latest titles and technology!

DUXBURY  
THOMSON  
BROOKS/COLE

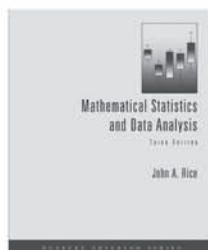
## AVAILABLE NOW!

### NEW TITLES IN INTERMEDIATE AND ADVANCED STATISTICS



**Modern Mathematical Statistics with Applications**

JAY L. DEVORE and  
KENNETH N. BERK  
©2007.



**Mathematical Statistics and Data Analysis, Third Edition**

JOHN A. RICE  
©2007.



**Experimental Design Using ANOVA**

BARBARA G. TABACHNICK and  
LINDA S. FIDELL  
©2007.

**Introduction to Regression Modeling**

BOVAS ABRAHAM and JOHANNES LEDOLTER  
©2006.

**Doing Data Analysis with SPSS®—Version 14**

ROBERT H. CARVER and JANE GRADWOHL NASH  
©2006.

**Investigating Statistical Concepts, Applications, and Methods**

BETH L. CHANCE and ALLAN J. ROSSMAN  
0-495-05064-4. ©2006.

**A First Course in Monte Carlo**

GEORGE FISHMAN  
©2006.

**Statistics with STATA, Updated for Version 9**

LAWRENCE C. HAMILTON  
©2006.

**Forecasting: Practice and Process for Demand Management**

HANS LEVENBACH and JAMES P. CLEARY  
©2006.

**Elementary Survey Sampling, Sixth Edition**

RICHARD L. SCHEAFFER, WILLIAM MENDENHALL, III, and R. LYMAN OTT  
©2006.

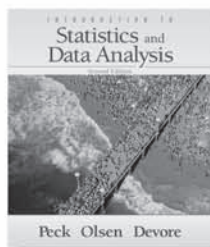
## TEACH EASIER. TEACH BETTER.



**Mind on Statistics, Third Edition**

JESSICA M. UTTS and  
ROBERT F. HECKARD  
©2007.

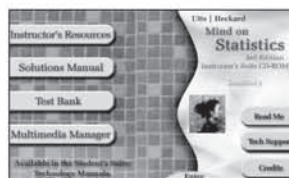
Get your students to think like statisticians with *Mind on Statistics*.



**Introduction to Statistics and Data Analysis, Second Edition—MEDIA UPDATE**

ROXY PECK,  
CHRIS OLSEN,  
and JAY DEVORE  
©2005.

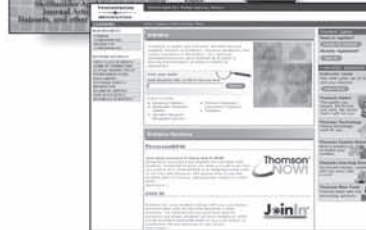
Communicate and interpret results with Peck, Olsen, and Devore.



**Technology Solutions to Fit Your Specific Needs**

We know that no two instructors or classes are the same.

That's why Duxbury is committed to providing a variety of technology solutions—online, on CD-ROM, and integrated within the book itself—so it's easier for you to find the tools that will best meet your (and your students')



specific needs. Visit our booth to learn about our technology solutions, including CyberStats, Instructor's Suite CD-ROMs, ThomsonNOW, and more.

Visit us at [www.thomsonedu.com/statistics](http://www.thomsonedu.com/statistics)



# GENERAL PROGRAM SCHEDULE

⊛ Themed Session ● Applied Session ❖ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

Center; Hua He, University of Rochester Medical Center

5:05 p.m. **Treatment of Spatial Autocorrelation in Geocoded Crime Data**—❖ Krista Collins, Statistics Canada; Colin Babyak, Statistics Canada

5:20 p.m. **Assessing Population Coverage in a Health Survey**—❖ Karen Davis, National Center for Health Statistics; Chris Moriarity, National Center for Health Statistics

5:35 p.m. **A Study of IRS Administrative Payroll as a Substitute for Missing Payroll**—❖ Melvin McCullough, U.S. Census Bureau

## 67 CC-606 ● ⊛ **Industrial Applications—Contributed**

Section on Quality and Productivity, Section on Physical and Engineering Sciences

*Chair(s): Angela Patterson, GE Global Research*

4:05 p.m. **Hierarchical Modeling Using GLMs To Improve Yield**—❖ Christina Mastrangelo, University of Washington; Naveen Kumar, University of Washington

4:20 p.m. **Sequential Analysis on Misspecified Distributions**—❖ Theresa Utlaut, Intel Corporation; Kevin Anderson, Intel Corporation

4:35 p.m. **On Robust Statistics**—❖ Kevin Anderson, Intel Corporation

4:50 p.m. **Robust Analysis of Variance: Process Design and Quality Improvement**—❖ Avi Giloni, Yeshiva University; Sridhar Seshadri, New York University; Jeffrey Simonoff, New York University

5:05 p.m. **Statistical Quality Control of Loadboards for Electronic Package Testers**—❖ Meihui Guo, National Sun Yat-sen University; Yu-Jung Huang, I-Shou University; Ming-Kun Chen, I-Shou University

5:20 p.m. **Statistical Monitoring of Multistage Processes**—❖ Fugee Tsung, The Hong Kong University of Science and Technology

5:35 p.m. **Stochastic Models for Predicting Product Failure Rate of Parenterals Due to Particulate Matter**—❖ Chi-Hse Teng, Pfizer Inc.

## 68 CC-616 ● ⊛ **Risk Assessment in Business and Finance—Contributed**

Section on Risk Analysis, Section on Quality and Productivity

*Chair(s): Duane Steffey, Exponent, Inc.*

4:05 p.m. **On the Application of the Latent-Variable Model To Predict Business Default**—❖ K. Paul Chin, Dun & Bradstreet, Inc.; Edgar Ortiz, Dun & Bradstreet, Inc.; Jianjing Ling, Dun & Bradstreet, Inc.

4:20 p.m. **Mixture Models Applied To Reject Inference**—❖ Billie Anderson, The University of Alabama; J. Michael Hardin, The University of Alabama; Ana Landeros, The University of Alabama; Michael Conerly, The University of Alabama

4:35 p.m. **How To Address Click Fraud in Pay-per-Click Programs**—❖ Vincent Granville, Authenticlick

4:50 p.m. **Application of Kernel Methods to Fraud Detection**—❖ Ravi Mallela, Equibits

5:05 p.m. **Partial Hedging Using Malliavin Calculus**—❖ Lan Nygren, Rider University; Lakner Peter, New York University

5:20 p.m. **An Econometric Model for Insurance Underwriting Using Bivariate Zero-Inflated Count Models**—K. Paul Chin, Dun & Bradstreet, Inc.; ❖ Edgar Ortiz, Dun & Bradstreet, Inc.

5:35 p.m. **Investigating the Determinants of Financial Harm and Predatory Lending through RDD and Victim Population Surveys**—❖ Danna Moore, Washington State University

## 69 CC-601 **Modeling—Contributed**

Section on Statistical Computing

*Chair(s): Wei Pan, University of Cincinnati*

4:05 p.m. **Finite Elements Methods for Density Estimation**—❖ George Terrell, Virginia Polytechnic Institute and State University

4:20 p.m. **On the Mixture of Multivariate Skew Normal Distributions**—❖ Jack C. Lee, National Chiao Tung University; Tsung-I Lin, National Chung Hsing University

4:35 p.m. **Latent Regression**—❖ Thaddeus Tarpey, Wright State University; Eva Petkova, Columbia University

4:50 p.m. **Estimation for Finite Mixture Multinomial Models**—❖ Nagaraj Neerchal, University of Maryland Baltimore County; Minglei Liu, Medtronic, Inc.; Jorge Morel, Procter & Gamble

5:05 p.m. **Predictive Discrepancy Using Full Cross-Validation for Regression Models**—❖ Mark Greenwood, Montana State University

5:20 p.m. **On the Nonnegative Garrote Estimator**—❖ Ming Yuan, Georgia Institute of Technology; Yi Lin, University of Wisconsin-Madison

5:35 p.m. **Latent Transition Analysis: Inference and Estimation**—❖ Hwan Chung, Michigan State University

## 70 CC-603 ● ⊕ **Bayesian Spatial and Spatio-Temporal Models—Contributed**

Section on Bayesian Statistical Science

*Chair(s): Peter F. Craigmile, The Ohio State University*

4:05 p.m. **Bayesian Change Point Analysis for Local Linear Regression: a New Approach to Prior Selection**—❖ Rajib Paul, The Ohio State University; L. Mark Berliner, The Ohio State University

4:20 p.m. **A Bayesian Dynamic Spatio-Temporal Interaction Model**—❖ Jacob Oleson, The University of Iowa; Hoon Kim, California State Polytechnic University, Pomona

4:35 p.m. **Multiresolution Hierarchical Dynamical Models for Spatio-Temporal Processes**—❖ Ali Arab, University of Missouri-Columbia; Christopher K. Wikle, University of Missouri-Columbia

4:50 p.m. **Spatial Bayesian Modeling of fMRI Data: a Multiple-Subject Analysis**—❖ Lei Xu, University of Michigan; Timothy D. Johnson, University of Michigan; Thomas Nichols, University of Michigan

5:05 p.m. **Bayesian Hierarchical Spatially Correlated Functional Data Analysis with Application to Colon Carcinogenesis**—❖ Veera Baladandayuthapani, M. D. Anderson Cancer Center; Raymond J. Carroll, Texas A&M University; Bani K. Mallick, Texas A&M University; Mee Young Hong, Texas A&M University

5:20 p.m. **Floor Discussion**

## 71 CC-605 ● **Designs for Clinical Trials and Other Studies—Contributed**

IMS, Biometrics Section, ENAR

*Chair(s): Rebecca Nugent, University of Washington*

4:05 p.m. **Identifiability of Placebo Responders via Potential Outcomes**—❖ Eva Petkova, Columbia University;

Thaddeus Tarpey, Wright State University; Yimeng Lu, Columbia University; Donald Klein, Columbia University

4:20 p.m. **Efficient Adaptive Designs for Clinical Trials**—❖ Jay Bartroff, Stanford University; Tze Leung Lai, Stanford University

4:35 p.m. **Remodified Continual Reassessment Method and the PBTC Experience**—❖ Arzu Onar, St. Jude Children's Research Hospital; Mehmet Kocak, St. Jude Children's Research Hospital; James Boyett, St. Jude Children's Research Hospital

4:50 p.m. **D-Optimal Designs for Compartmental Models**—❖ Gang Li, GlaxoSmithKline; Dibyen Majumdar, University of Illinois at Chicago

5:05 p.m. **Robust Designs for Binomial Data**—❖ Adeniyi Adewale, University of Alberta; Douglas P. Wiens, University of Alberta

5:20 p.m. **Exact D-Optimal Designs for Second-Order Response Surface Model on a Sphere and with Qualitative Factors**—❖ Chuan-Pin Lee, National Sun Yat-sen University; Mong-Na Lo Huang, National Sun Yat-sen University; Ray-Bing Chen, National University of Kaohsiung

5:35 p.m. **D-Optimal Designs for Combined Polynomial and Trigonometric Regression on a Partial Circle**—❖ Fu-Chuen Chang, National Sun Yat-sen University

## 72 CC-2A ● **Clinical Trial Design and Analysis—Contributed**

Biopharmaceutical Section, Biometrics Section, WNAR, ENAR

*Chair(s): Sheng Feng, Duke University*

4:05 p.m. **Note on Randomization-Based Inferences for Randomized Clinical Trials**—❖ Guohua Pan, Johnson & Johnson Pharmaceutical R&D; Yibin Wang, Novartis Pharmaceuticals Corporation

4:20 p.m. **Four Types of Sums of Squares and Estimates of Treatment Differences in Multicenter Clinical Trials**—❖ Daozhi Zhang, DOV Pharmaceutical, Inc.

4:35 p.m. **Optimal Allocation of Units When Comparing k Treatments to Two Controls of Unequal Importance**—❖ Nairanjana Dasgupta, Washington State University

4:50 p.m. **A Method for Testing a Prespecified Subgroup in Clinical Trials**—❖ Yang Song, Johnson & Johnson Pharmaceutical R&D; George Chi, Johnson &



# GENERAL PROGRAM SCHEDULE

⊛ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

- Johnson Pharmaceutical R&D
- 5:05 p.m. **Some Issues in Fitting Clinical Count Data with Poisson Regression Model**—◆ Abdul Sankoh, sanofi-aventis
- 5:20 p.m. **Interval Estimation of Risk Ratio in the Simple Compliance Randomized Trial**—◆ Kung-Jong Lui, San Diego State University
- 5:35 p.m. **Floor Discussion**

**73**

**CC-2B**

## ● Phase II Trials—Contributed

Biopharmaceutical Section, Biometrics Section, ENAR

*Chair(s): Dennis Cosmatos, Wyeth Research*

- 4:05 p.m. **A Parallel Phase I/II Clinical Trial Design for Combination Therapies**—◆ Xuelin Huang, M. D. Anderson Cancer Center; Swati Biswas, University of North Texas Health Science Center; Yasuhiro Oki, M. D. Anderson Cancer Center; Jean-Pierre Issa, M. D. Anderson Cancer Center; Donald Berry, The University of Texas
- 4:20 p.m. **Three-Outcome Design for Randomized Comparative Phase II Clinical Trials**—◆ Shengyan Hong, Eli Lilly and Company; Yanping Wang, Eli Lilly and Company
- 4:35 p.m. **Optimal Trial Designs for Screening Cancer Therapeutic Agents**—◆ Vandana Mukhi, New York University School of Medicine; Yongzhao Shao, New York University; Judith D. Goldberg, New York University School of Medicine
- 4:50 p.m. **Optimal Adaptive Designs in Phase II Trials**—◆ Anindita Banerjee, North Carolina State University; Anastasios A. Tsiatis, North Carolina State University
- 5:05 p.m. **Optimal Two-Stage Designs for Phase II Clinical Trials for Continuous Endpoints**—◆ Chinfu Hsiao, National Health Research Institutes; Hsiao-Hui Tsou, National Health Research Institutes; Jen-pei Liu, National Taiwan University; Shein-Chung Chow, Duke University
- 5:20 p.m. **Critical Statistical Issues in the Design and Analysis of Proof-of-Concept Clinical Trials in Multiple Sclerosis**—◆ Chris Assaid, Merck & Co., Inc.
- 5:35 p.m. **Floor Discussion**

**74**

**CC-212**

## ● Methods for Incomplete Data—Contributed

Biometrics Section

*Chair(s): Yichuan Zhao, Georgia State University*

- 4:05 p.m. **Semiparametric Models and Sensitivity Analysis of Longitudinal Data with Nonrandom Dropouts**—◆ David Todem, Michigan State University; Kyung Mann Kim, University of Wisconsin-Madison; Jason P. Fine, University of Wisconsin-Madison
- 4:20 p.m. **Methods on Longitudinal Data with Dropouts and Mismeasured Covariates**—◆ Grace Y. Yi, University of Waterloo
- 4:35 p.m. **Semiparametric Analysis of Longitudinal Data with Potential Right Censoring**—◆ Mengling Liu, New York University School of Medicine; Zhiliang Ying, Columbia University
- 4:50 p.m. **A Multiple Imputation Approach for Responders Analysis in Longitudinal Studies**—◆ Liqiu Jiang, North Carolina State University; Kaifeng Lu, Merck & Co., Inc.; Anastasios A. Tsiatis, North Carolina State University
- 5:05 p.m. **Estimation of Transition Probabilities in a Discrete-Time Markov Chain with Missing Observations**—◆ Hung-Wen Yeh, The University of Texas School of Public Health; Wenyaw Chan, The University of Texas School of Public Health
- 5:20 p.m. **Nonparametric Comparison of Two Survival Functions with Dependent Censoring via Nonparametric Multiple Imputation**—◆ Chiu-Hsieh Hsu, University of Arizona; Jeremy M. G. Taylor, University of Michigan
- 5:35 p.m. **Multivariate One-Sided Hypotheses Testing with Complete or Incomplete Data**—◆ Tao Wang, The University of British Columbia; Lang Wu, The University of British Columbia

---

## Regular Contributed Posters

**4:00 p.m.–5:50 p.m.**

---

**75**

**CC-Level 6 East Lobby**

## Contributed Posters—Contributed

Biometrics Section, Biopharmaceutical Section, General Methodology, Section on Nonparametric Statistics, Section on Physical and Engineering Sciences, Section on Survey Research Methods, Section on Quality and Productivity

*Organizer(s): Maura E. Stokes, SAS Institute, Inc.*

*Chair(s): Maura E. Stokes, SAS Institute, Inc.*

## Biometrics, biostatistics, epidemiology

- 01 **Examining the Effect of Biomarkers in Terms of Pathological Compartmentalization and a Continuous Variable**—❖ Irene Helenowski, Northwestern University; Edward F. Vonesh, Baxter Healthcare Corporation; Ryan J. Deaton, University of Illinois at Chicago; Borko Jovanovic, Northwestern University; Alfred W. Rademaker, Northwestern University; Sally A. Freels, University of Illinois; Vijayalakshmi Ananthanarayanan, University of Illinois at Chicago; Peter H. Gann, University of Illinois at Chicago

## Clinical trials, drug discovery

- 02 **Minimum Sample Size in Control Group When Comparing Efficacy Rate with Several Treatment Groups**—❖ Alan Davis, Pharmanet; Inder J. Sharma, Sharma Associates, Inc.
- 03 **Exploring the Relationship between Extended Oral Anticoagulant Therapy after a First Episode of Venous Thrombosis and Mortality Using Meta-analysis**—❖ Brianna Miller, The University of Oklahoma
- 04 **Interval Estimation of Binomial Proportion in Clinical Trials with a Two-Stage Design**—❖ Chen Chia Min, National Cheng Kung University
- 05 **GLUMIP 2.0: Free SAS/IML<sup>®</sup> Software for Planning Internal Pilots**—❖ John Kairalla, The University of North Carolina at Chapel Hill; Christopher S. Coffey, The University of Alabama at Birmingham; Keith E. Muller, The University of North Carolina at Chapel Hill
- 06 **Stroke Clinical Trials and Response-Adaptive Randomization: an Ideal Match**—❖ Yuko Palesch, Medical University of South Carolina; Amy Bardeen, Medical University of South Carolina; Renee Martin, Medical University of South Carolina
- 07 **Multivariate Applications in Systems Biology**—❖ Amber Anderson, GlaxoSmithKline; Zhu Lei, GlaxoSmithKline; Edit Kurali, GlaxoSmithKline; Amit Bhattacharyya, GlaxoSmithKline; Kwan Lee, GlaxoSmithKline; Michael Durante, GlaxoSmithKline
- 08 **Comparing the Performance of Three Asymptotic Methods in Estimating the Sample Size for a Therapeutic Equivalence Study Based on Difference of Proportions**—❖ Xiaoning Li, The University of Oklahoma Health Sciences Center; Sara K. Vesely, The University of Oklahoma Health Sciences Center
- 09 **Recent Development in Exact Inference for Parallel Group Design with Repeated Binary Measurements**—❖ Dar-Shong Hwang, B.R.S.I.; James Lee, Sankyo Pharma Development

- 10 **Issues of Covariate Adjustments in Clinical Trials**—❖ Moh-Jee Ng, U.S. Food and Drug Administration; Tie-Hua Ng, U.S. Food and Drug Administration
- 11 **Can We Recruit Additional Subjects for a Failed Study?**—❖ Paul Hshieh, U.S. Food and Drug Administration; Tie-Hua Ng, U.S. Food and Drug Administration

## Incomplete data analysis, imputation methods

- 12 **Multiple Imputation by Chained Equations: Predictive Mean Matching**—❖ Gerald Kolm, Emory University; Deborah Ehrental, Christiana Care Health System; Edward Ewen, Christiana Care Health System
- 13 **Weighted Logrank-Type Tests Based on Doubly Truncated Data**—❖ Su Pei Fang, National Cheng Kung University
- 14 **Kernel-Assisted EM Algorithm**—❖ Suzanne Dubnicka, Kansas State University

## Pharmacokinetics and pharmacodynamics

- 15 **The Analysis of Mixed-Effects Compartmental Systems Using Bayesian and non-Bayesian Methods**—❖ Yi Wang, University of Nebraska-Lincoln; Kent M. Eskridge, University of Nebraska-Lincoln; Shunpu Zhang, University of Nebraska-Lincoln

## Reliability and survival modeling

- 16 **An Application of Accelerated Lifetime Design/Analysis for Estimating the Lifetime of CDs and DVDs**—❖ James J. Filliben, National Institute of Standards and Technology; Adriana Hornikova, National Institute of Standards and Technology; Frederick R. Byers, National Institute of Standards and Technology
- 17 **Parametric Distance Estimators versus Maximum Likelihood Estimators in Estimating Quantiles with Misclassified Data**—❖ Elliott Nebenzahl, California State University, East Bay; Dean Fearn, California State University, East Bay
- 18 **A Hyperbolastic Model for Survival Data**—❖ Zoran Bursac, University of Arkansas for Medical Sciences; Mohammad Tabatabai, Cameron University; David K. Williams, University of Arkansas for Medical Sciences; Karan P. Singh, University of North Texas Health Science Center
- 19 **Survival Analysis on Recurrent Event Data: an Application to Alcoholism Study**—❖ Jian Han, Bristol-Myers Squibb Company
- 20 **Exact Test for an Epidemic Chance in a Sequence of Exponentially Distributed Random Variables**—❖ Ping Shing Chan, The Chinese University of Hong Kong; Kim Fung Lai, The Chinese University of Hong Kong

# GENERAL PROGRAM SCHEDULE

⊕ Themed Session ● Applied Session ◆ Presenter CC-Washington State Convention & Trade Center H-Grand Hyatt Seattle S-Sheraton Seattle Hotel & Towers

## Semiparametric and nonparametric methods

- 21 **Locally Efficient Estimators for Semiparametric Models with Measurement Error**—◆ Yanyuan Ma, Texas A&M University; Raymond J. Carroll, Texas A&M University
- 22 **A Graphical Method for Testing the Equality of Regression Curves**—◆ Kee-Hoon Kang, Hankuk University of Foreign Studies; Cheolwoo Park, University of Georgia
- 23 **A Permutation Test for Compound Symmetry**—◆ Tracy Morris, Oklahoma State University; Mark Payton, Oklahoma State University

---

## Regular Contributed Posters 8:00 p.m.–9:50 p.m.

---

### 76 **CC-Level 6 East Lobby Contributed Poster Session with Opening Mixer: a Look at the Richness of Statistical Interests— Contributed**

ENAR, Section on Statistical Computing, Section on Statistics in Epidemiology, Biometrics Section, Biopharmaceutical Section, Business and Economics Statistics Section, General Methodology, Section on Government Statistics, Section on Physical and Engineering Sciences, Social Statistics Section, Section on Survey Research Methods, Section on Statistical Education, Section on Statistics and the Environment

*Organizer(s): Maura E. Stokes, SAS Institute, Inc.*

*Chair(s): Maura E. Stokes, SAS Institute, Inc.*

### Bayesian statistics, hierarchical models

- 01 **A Bayesian Approach to Semicontinuous Longitudinal Data**—◆ Bing Han, The Pennsylvania State University; Wei Huang, Temple University

### Biometrics, biostatistics, epidemiology

- 02 **Survival Instantaneous Log-Odds Ratio from Empirical Functions**—◆ JungAh Jung, Novartis Pharmaceuticals Corporation; J. Wanzer Drane, University of South Carolina
- 03 **LTAS.NET: a NIOSH Life Table Analysis System for the Windows Environment**—◆ Mary Schubauer-Berigan, National Institute for Occupational Safety and Health; William R. Raudabaugh, Constella, Inc.; Avima Ruder, National Institute for Occupational Safety and Health; Misty Hein, National Institute for Occupational Safety and Health; Sharon R. Silver, National Institute for Occupational Safety and Health; Patricia Laber, National Institute for Occupational Safety and Health; Kathleen Waters, National Institute for Occupational

Safety and Health; Jinghui Liu, Westat; Steven Spaeth, Kyle Steenland, Emory University

- 04 **Estimating Lifetime Prevalence Using Data from Disease Registries**—◆ Limin X. Clegg, National Cancer Institute
- 05 **Epidemiology of Herpes Zoster (Shingles)**—◆ Peter Wollan, Olmsted Medical Center; Patricia Saddier, Merck Research Laboratories; Lina Sy, Merck Research Laboratories; Barbara P. Yawn, Olmsted Medical Center

### Business, financial, marketing statistics

- 06 **What We Know about Unsuccessful and Successful High-Risk R&D Projects and What We Can Learn from Them**—◆ Stephanie Shipp, National Institute of Standards and Technology

### Clinical trials, drug discovery

- 07 **Data Simulation Methodologies for Determining Sample Size Requirements To Test Gene-Drug Interactions in Genetically Pre-Screened Populations**—◆ Kimberly Lowe, University of Arizona College of Public Health; James Ranger-Moore, University of Arizona College of Public Health; Patricia Thompson, Arizona Cancer Center

### Computational statistics, numerical methods

- 08 **Wavelet-Based Functional Mixed Model Data Analysis: Computational Considerations**—◆ Richard Herrick, M. D. Anderson Cancer Center; Jeffrey S. Morris, M. D. Anderson Cancer Center

### Engineering and physical sciences, chemometrics

- 09 **Hierarchical Bayesian Calibration of Untested Devices**—◆ Reid Landes, University of Arkansas for Medical Sciences

### Environmetrics, ecology, agriculture, wildlife management

- 10 **Strip Transect Sampling To Estimate Object Abundance in Homogeneous and Nonhomogeneous Poisson Fields: a Simulation Study of the Effects of Transect Width and Number**—◆ Timothy C. Coburn, Abilene Christian University; Sean A. McKenna, Sandia National Laboratories; Hirotaka Saito, University of California, Riverside; Orlando T. Garcia, Sandia National Laboratories

### General

- 11 **The Impact of Computer Programming Languages on Statistics**—◆ Morteza Marzjarani, Saginaw Valley State University

## Genetics, bioinformatics, computational biology

- 12 **Analyzing a Metabolomics Dataset**—❖ Teresa Norris
- 13 **Inferring Quantitative Trait Loci Using a Bayesian Variable Selection Model and Markov Chain Monte Carlo Convergence Diagnostics**—❖ Daniel Shriner, The University of Alabama at Birmingham; Nengjun Yi, The University of Alabama at Birmingham
- 14 **Estimating p-Values in Small Microarray Experiments**—❖ Hyuna Yang, The Jackson Lab; Gary Churchill, The Jackson Lab
- 15 **Multivariate Simulation of Gene Expression Data**—❖ Rudolph Parrish, University of Louisville; Horace J. Spencer, University of Arkansas for Medical Sciences

## Government statistics

- 16 **Treating Breaks in Time Series in the Current Employment Statistics State and Area Program**—❖ James White, Bureau of Labor Statistics; Kenneth Shipp, Bureau of Labor Statistics

## Linear models, GLMs, parametric methods

- 17 **On the Likelihood Ratio Test for the Numbers of Factors in Exploratory Factor Analysis**—❖ Kentaro Hayashi, University of Hawaii at Manoa; Peter M. Bentler, University of California, Los Angeles; Ke-Hai Yuan, University of Notre Dame

## Longitudinal data, repeated measurements, cluster data

- 18 **GEE Models for Longitudinal Analysis of Long-Term Occupational Radiation Exposures in Russian Nuclear Workers**—❖ Adina Soaita, University of Pittsburgh; Ada O. Youk, University of Pittsburgh; Richard Day, University of Pittsburgh; Tamara Azizova, Southern Ural Biophysics Institute; Niel Wald, University of Pittsburgh; Mike Kuniak, University of Pittsburgh; David M. Slaughter, University of Utah; Carol K. Redmond, University of Pittsburgh
- 19 **Antioxidant Use Predicts Transitions to Amnestic MCI and Dementia**—❖ Marta Mendiondo, University of Kentucky; Richard J. Kryscio, University of Kentucky; Fred A. Schmitt, University of Kentucky
- 20 **Structural Nested Mean Models for Assessing Time-Varying Effect Moderation: a Comparison of Two Estimation Methods**—❖ Daniel Almirall, University of Michigan

## Neuroscience, brain imaging

- 21 **Methods for Assessing Changes in the FMRI Visual Field Map after Surgery**—❖ Raymond G. Hoffmann, Medical College of Wisconsin; Paul Savarapian,

Marquette University; Mary Jo Maciejewski, Medical College of Wisconsin; Edward A. DeYoe, Medical College of Wisconsin; Daniel Rowe, Medical College of Wisconsin

## Sampling and survey methodology

- 22 **Design-Based versus Model-Based Methods: a Comparative Study Using Longitudinal Survey Data**—❖ Sunita Ghosh, University of Saskatchewan; Punam Pahwa, University of Saskatchewan; Geert Molenberghs, Limburgs Universitair Centrum
- 23 **Hierarchical Generalized Linear Models for Data from Complex Sampling Designs**—❖ Prabhu Bhagavatheeswaran, Southern Methodist University; Ian Harris, Southern Methodist University

## Social and behavioral science

- 24 **Mediation Analysis with Multilevel Data**—❖ Jungwha Lee, Institute for Health Research and Policy; Eisuke Segawa, Institute for Health Research and Policy; Sue Curry, University of Illinois at Chicago

## Spatial statistics, time series, spatio-temporal modeling

- 25 **The Application of the Kalman Filter to Nonstationary Time Series through Time Deformation**—❖ Zhu Wang, Fred Hutchinson Cancer Research Center; Henry L. Gray, Southern Methodist University; Wayne A. Woodward, Southern Methodist University

## Teaching, training, consulting

- 26 **Is It Normal? A Simulation Study of Properties of Some Normality Tests**—❖ Daniel M. Sultana, California State University, East Bay; Charlyn J. Suarez, California State University, East Bay; Bruce E. Trumbo, California State University, East Bay; Eric A. Suess, California State University, East Bay
- 27 **Classroom Simulation: False Indications of Outliers in Boxplots of Normal Data**—❖ Bruce E. Trumbo, California State University, East Bay; Eric A. Suess, California State University, East Bay; Jacob Colvin, California State University, East Bay





Call for articles for the issues: 2, 3 & 4 in 2006

## Model Assisted Statistics and Applications ( MASA ) -- An international journal

### Editor-in-Chief:

Sarjinder Singh

Department of Statistics

St. Cloud State University

St. Cloud, MN 56301, USA.

E-mail: sarjinder@yahoo.com

sarjinder@gmail.com

### Managing Editor:

Stephen Horn

(Australia)

### Treasurer:

Sylvia R. Valde (USA)

$$\text{Model: } y = f(X) + e$$

ISSN: 1574-1699

The Journal is published by IOS Press.

Authors are requested to submit their article electronically either in PDF or Word format by e-mail to the Editor-in-Chief.

For details, please visit [www.iospress.nl](http://www.iospress.nl)

### Associate Editors:

#### Sampling:

R. Arnab (S. Africa)

M.L. Bansal (India)

Jong-Min Kim (USA)

Marcin Kozak (Poland)

S.S. Osahan (USA)

S.R. Puertas (Spain)

H.P. Singh (India)

Guohua Zou (China)

#### Econometrics:

B.R. Garg (India)

Maxwell L. King (Australia)

#### Time Series:

B. Gill (USA)

S.K. Singla (India)

#### Design of Experiments:

M. Khoshnevisan (Australia)

M.S. Virk (India)

#### Multivariate Analysis:

A.H. Joarder (Saudi Arabia)

#### Special Topics:

Applications and Simulations

Ross Corkrey (Australia)

Balbinder Deo (Canada)

Munir Mahmood (Australia)

Leonard C. Onyiah (USA)

P. Ramalingam (USA)

Tejwant Singh (India)

Sylvia R. Valdes (USA)

#### Assistant Editor:

Michael Scheltgen (Canada)

#### Editorial Board Members:

Prem Chandra (India)

Inderjeet Grewal (India)

Pranesh Kumar (Canada)

Gi-Sung Lee (Korea)

Ki-Hak Hong (Korea)

N.S. Mangat (Canada)

S.S. Sidhu (India)

Chang-Kyoon Son (Korea)

Jaswinder Singh (USA)

L.N. Upadhyaya (India)

Med Ram Verma (India)

Zaizai Yan (China)

**FIRST ISSUE  
NOW  
AVAILABLE**

[WWW.IOSPRESS.NL](http://WWW.IOSPRESS.NL)

**MASA**

[WWW.IOSPRESS.NL](http://WWW.IOSPRESS.NL)

VISIT: [www.wkap.nl](http://www.wkap.nl)

### Advanced Sampling Theory with Applications

How Michael 'Selected' Amy

By

Sarjinder Singh Department of Statistics, St. Cloud State University, Minnesota, USA

A Multipurpose, Two Volume Text!

A textbook for teachers/students, a reference manual for researchers.

A Practical Guide for Statisticians!

The book highlights basic concepts to advanced technology including: SRSWR, SRSWOR, Ratio and regression type estimators, Bias filtration, Median estimation, PPSWR, Multi-character survey; PPSWOR, RHC strategy, Calibration of estimators of total, variance, and distribution function etc., Multi-phase, Systematic, Stratified and Post-stratified, Cluster, Multi-stage, RR, Imputation, Measurements errors, Small area estimation, and many more fun and exciting topics!

Includes Many Special Features and Attractions!

1247 pages; 1179 research papers/references; 162 solved numerical examples; 335 unsolved theoretical exercises; 177 unsolved data based practical problems; Simple notation; smooth flow to reading; complete proofs to theorems and numerical examples; up-to-date; new ideas for future research.

The Author

Dr. Sarjinder Singh is an Assistant Professor at St. Cloud State University, St. Cloud, MN, U.S.A.. He has published over 80 research papers. He introduced ideas of higher order calibration, hybridizing imputation and calibration, bias filtration, hidden gangs, several new randomized response models, median estimation using two-phase sampling, and exact traditional linear regression estimator using calibration.

For more information, visit: <http://www.wkap.nl/prod/b/1-4020-1689-1>

 **kluwer**  
the language of science

## Thinking Statistically

*Elephants Go to School*

A UNIQUE TEXTBOOK

By

*Sarjinder Singh*

St. Cloud State University

Department of Statistics

St. Cloud, MN 56301-4498

U.S.A.

Forewords by

David Robinson

and

Stephen Horn

A new way to learn statistics using pictures, jokes, and tales.

A lot of learning with fun through 676 pages.

Good for all ages

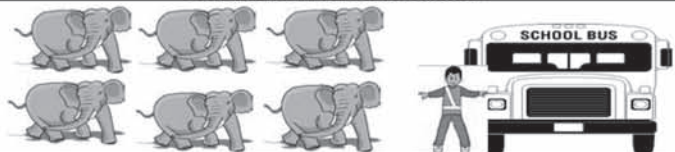
+ Good for all libraries

+ Good for all majors

+ Good for all schools

+ Good for you too

PLEASE HAVE A LOOK



Kendall/Hunt Publishing Company 4050

Westmark Drive, P.O. Box 1840 Dubuque

Iowa 52004-1840, U.S.A.

[www.kendallhunt.com](http://www.kendallhunt.com)