With Bio-Rad's Family of Microplate Array. Systems and Accessories.

enchmark Pjüs

the ful

ctrum

Car

Wherever you are in your microplate analysis, Bio-Rad's got you covered. If it's at readers you need, choose from the personal Model 550, the standard Benchmark high-throughput Ultramark", or the state-of-the-art Benchmark Plus microplate readers or glow-type luminescence such as reporter gene assays, go with the brit Lumimark " or Lumimark Plus" reader. There's even a Lural" test plate access your instrument. Whether you're at the far end of the spectrum, or just a labor has the right tool for your needs.

What Will You Discover Next?

Visit us on the Web at discover.bio-rad.com. Call toll free at 1-800-4BIORAD (1-800-424-6723); outside the US, contact your local sales office.



NEW PRODUCTS

StatMate GraphPad Software

San Diego, CA \$95, or \$30 with purchase of InStat or Prism; StatMate.net pricing not available. 619-457-3909 www.statmate.net

STATISTICS FRIEND

GraphPad's StatMate aims to help researchers take the guesswork out of statistics and to educate them as well. The program is a simple companion to the larger InStat or Prism packages and, in fact, works well with any statistical program.

StatMate is provided in two versions (one Windows-based and the other Web-based) and is easy to use.

To use the program, a user clicks on a topic (known as a calculator), answers a few easy questions, and receives informative output. The program contains many different calculators. Stat-Mate can determine sample size and power for comparing two means with a *t* test or two proportions with a chi-square test. StatMate also can calculate confidence intervals for counts and proportions, *P* values from statistical ratios (*t*, *z*, *F*, chi-square, or r^2), binomial and Poisson distributions, Bayesian calculations, and more. Help is provided to explain each of the calculators and how to understand the output in simple terms. In addition, the GraphPad Web site provides ample explanation and coverage on some basic principles of statistics.

The Web version, available as a free preview at www.statmate.net, has all the features of the Windows version and more. It adds sample size and power calculations for one-way analysis of variance (ANOVA) and for survival analysis. It also can do a few simple statistical tests, including *t* test and chi-square. This approach, which is independent of user platform, will be welcomed by Macintosh and Windows users alike. StatMate.net mirrors most of StatMate's features, and will progress and grow with time. The only requirement for StatMate.net is an Internet connection. Connection speed may be a limiting factor in some cases, but no differences were noted in operating speed when StatMate was compared with the Web version used on a university network.

An online \$25 version won't install without Prism or InStat, but the \$95 version will. The disk-based version of StatMate costs \$30 if bought with either program or \$95 if purchased separately. A further discount is offered for on-line ordering. There is no demo version available; however, one can preview StatMate.net at www.statmate.net. StatMate.net will become a subscription-based service, but pricing details are not yet available.

—Frank Hoover

Haukeland Hospital, Department of Oncology, Onkologisk Forskning Lab, 5021 Bergen, Norway. E-mail: frank.hoover@vir.uib.no

Imaging Associates

For more information +44 (0) 1844 213790 www.imas.co.uk www.scienceproductlink.org

AUTOMATED FISH SPOT COUNTING

MetaCyte is a scanning image cytometer for automated spot counting of fluorescence in situ hybridization (FISH) signals in inter-

phase nuclei. MetaCyte combines high resolution and flexibility of microscopy with the high throughput of flow cytometry. Fully automated scanning of up to 100 slides is possible with 500 to 1000 cells being scanned per minute. The initial scan identifies the cells containing single, viable nuclei, and automatically relocates them to be ready for further analysis. FISH signals from the nuclei are then counted providing quantitative measurement of amplification or deletion of chromosome loci. In addition, simultaneous detection of multiple fluorescence probes (from ultraviolet to far infrared) is possible, which can be used to identify chromosome translocations such as Philadelphia chromosome.

Brinkmann Instruments

For more information 516-334-7500 www.brinkmann.com **www.scienceproductlink.org**

ELECTROPORATOR

The Multiporator is an innovative electroporation system. With its combination of electronically regulated pulses in the microsecond range (patent pending) and a new

buffer system, it delivers optimum transfection. The Multiporator can be adapted modularly to suit the task at hand, whether it involves human or animal cells, plants, bacteria, yeasts, or electrofusion. The optional integrated Bacteria module can be used for efficient transformation of prokaryotes. A patent-pending electronic circuit ensures that the selected pulse parameters are maintained exactly, irrespective of the sample resistance. Pulsing times in the microsecond range drastically reduce the damage to sensitive cells.

Leica

For more information 800-248-0123 www.leica-microsystems.com www.scienceproductlink.org **INVERTED RESEARCH MICROSCOPE** The Leica DM IRE2 inverted re-

The Leica DM IRE2 inverted research microscope for live cell research combines motorization, automation, ergonomy, and optimized system compatibility. The DM IRE2

features a motorized magnification changer to avoid unnecessary vibrations of manual magnification change. The vibrationsensitive switchover of the viewing ports is also motor-driven. It features a motorized fluorescence turret with controls integrated into the microscope, reducing the footprint and increasing access

to manipulation tools. Options include a motorized objective nosepiece and focus. The motorized nosepiece is beneficial when complex micromanipulation instruments are mounted on the stand. The shape of the illumination column and microscope stage allows optimum connection of micromanipulators and micro-



tools for live cell research. Objective selection, illumination intensity, focusing, and fluorescent filter position (up to eight) can be controlled with a separate satellite remote control unit that can be conveniently placed on either side of the microscope.

Biodesign International

For more information 888-530-0140 www.biodesign.com **www.scienceproductlink.org**

ANTIBODY PAIRS FOR IMMUNOASSAY DEVELOPMENT

A repertoire of more than 50 pairs of antibodies for immunoassay development can be used to create screening, qualitative, and quantita-

tive enzyme-linked immunosorbent assays that detect various analytes. Antibody pairs are available for infectious diseases such as adenovirus, diphtheria, hepatitis B, rotavirus, salmonella, canine distemper virus, and canine parvovirus. Cardiac marker antibody pairs include CK-MB, CK-MM, CRP, D-dimer, fatty acid binding protein, myoglobin, troponin I, and troponin T. A broad range CONTINUED ON PAGE 878

NEW PRODUCTS

of cancer markers includes: CA 125, CA 15-3, carcinoembryonic antigen, Muc1 glycoprotein, prostate specific antigen, and S-100. Additional antibody pairs available include IgA, IgE, human chorionic gonadotropin, luteinizing hormone, thyroid stimulating hormone, and more.

Pierce Chemical Company For more information 800-874-3723 www.piercenet.com

SEPARATION DEVICES FOR CHROMATOGRAPHY

New Handee Devices, designed for the efficient manipulation of small www.scienceproductlink.org volumes of chromatography supports, come in three formats (Spin

Cup Columns/Mini-Spin Columns, Resin Separators, and Microcentrifuge Tubes) to offer better protein recovery than possible with traditional batch processing methods. With the Handee Spin Cup Columns, the user applies the chromatography resin and samples to the cup and uses a microcentrifuge for washing and eluting the sample. Researchers can use the Handee Mini-Spin Columns to do washes and elutions with a syringe for microcentrifuge-free separations. The Resin Separators are suitable for larger volumes (250 μ l to 1 ml) of resin with which there is no need to use a microcentrifuge or a syringe. The user simply slides the resin separator into a 16-mm by 100-mm test tube containing the support and sample. The separator compresses the resin away from the sample, which is then simply decanted out of the tube.

AMRESCO

For more information 800-448-4442 www.amresco-inc.com www.scienceproductlink.org

GENOMIC DNA ISOLATION KITS

The Cyclo-Prep DNA Isolation Kit is a spin-column based kit for rapid purification of genomic DNA from up to 30 mg of animal tissue or 1×10^9 bacterial cells. With this

simple alternative to common genomic DNA purification procedures, you can now prepare ultra-pure genomic DNA (A₂₆₀/A₂₈₀ \geq 1.8) using a tabletop microcentrifuge as early as 20 min after sample lysis. The genomic DNA isolated can be used for polymerase chain reaction amplification, restriction fragment length polymorphism analysis, Southern blotting, DNA fingerprinting, and bacterial-genome sequencing.

Gene Therapy Systems

For more information 619-457-1919 www.genetherapysystems.com www.scienceproductlink.org

PROTEIN DELIVERY REAGENT

BioPORTER is a lipid-based protein delivery reagent that effectively translocates proteins, peptides, and antibodies into living cells. It interacts noncovalently with the pro-

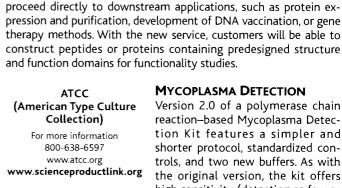
tein of choice and forms a protective vehicle for functional protein delivery into diverse cell types. BioPORTER offers speed and convenience in protein functionality studies by eliminating the need for transcription and translation.

Thermo Hybaid

For more information 888-4-HYBAID www.hybaid.com www.scienceproductlink.org

MOLECULAR BIOLOGY SERVICES A line of custom biomolecular synthesis services has been expanded to

include a wide range of genetic engineering techniques, including poly-



MYCOPLASMA DETECTION

Version 2.0 of a polymerase chain reaction-based Mycoplasma Detection Kit features a simpler and shorter protocol, standardized controls, and two new buffers. As with the original version, the kit offers high sensitivity (detecting as few as

1 CFU per sample) and a broad detection range (identifying more than 25 species including all known cell culture contaminants). Results are available in just 3 hours. More than 15% of cell cultures harbor mycoplasma, an unseen source of contamination that can wreak havoc on experiments.

merase chain reaction amplification, site-directed mutagenesis of

cloned DNA, and gene expression studies. These services are added

to an offering of custom gene synthesis. In this service, established

procedures of chemical DNA synthesis and enzymatic co-polymer-

ization are used to assemble artificial genes, ligate them into appropriate vectors, and clone them into Escherichia coli. Documenta-

tion is supplied illustrating the assembly process and the nature of

the DNA or E. coli host, respectively. This enables the customer to

Miltenyi Biotec

For more information +49-2204-8306-0 www.MiltenyiBiotec.com www.scienceproductlink.org

MAGNETIC ISOLATION OF BIOMOLECULES

Magnetic isolation of biomolecules using MACS technology is an effective and innovative method of isolating any biotinylated molecule as

a capture probe for your molecule of interest, such as RNA or DNA binding molecules. The biotinylated probe binds the molecule of interest and is labeled by µMACS Streptavidin MicroBeads. This complex can be separated over a MACS column inserted in a µMACS magnet separator. The column technology allows convenient and effective washing steps leading to a lower background. With stringent washing, you get high purity for downstream applications. Finally, you elute only your molecule of interest without the biotinylated probe.

Amersham Pharmacia Biotech

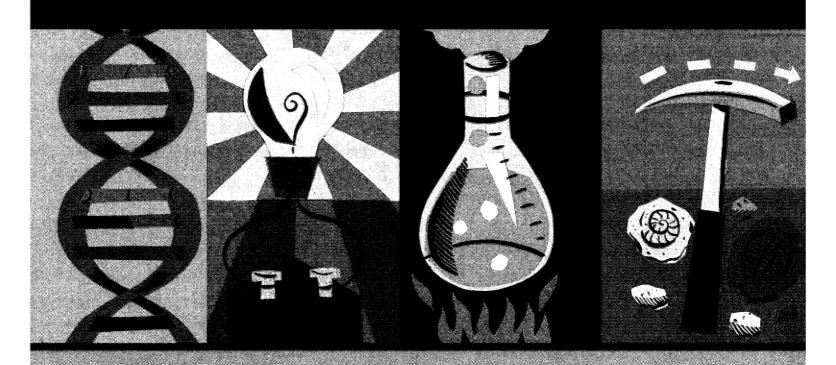
For more information 800-526-3593 www.apbiotech.com/membranegene www.scienceproductlink.org

LITERATURE

Products for Membrane-Based Gene Expression is a 20-page catalog that features products for a range of techniques from mRNA purification, through labeling and hybridization to imaging and analysis. It highlights

new products such as Hybond Atlas cDNA Expression Arrays, Hybond Northern Blots, and HotScribe First-Strand cDNA Labeling Kit. It includes comprehensive maps to guide researchers in selecting the right product for each step in the application.

Newly offered instrumentation, apparatus, and laboratory materials of interest to researchers in all disciplines in academic, industrial, and government organizations are featured in this space. Emphasis is given to purpose, chief characteristics, and availability of products and materials. Endorsement by Science or AAAS of any products or materials mentioned is not implied. Additional information may be obtained from the manufacturer or supplier by visiting www.scienceproductlink.org on the Web, where you can request that the information be sent to you by e-mail, fax, mail, or telephone.



Check Out Our New Website!



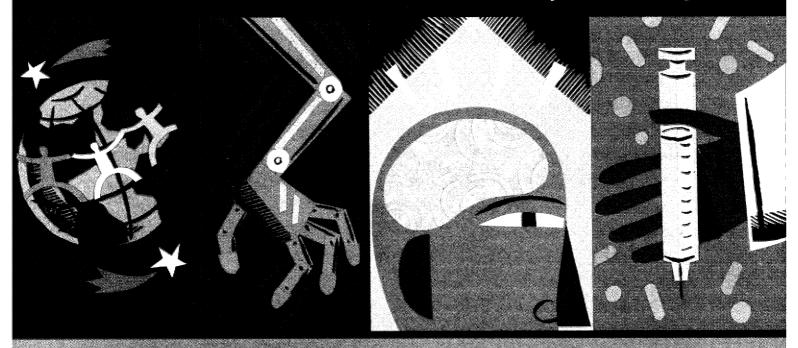
Visit our newly redesigned AAAS Annual Meeting Web site: www.aaasmeeting.org

> NETWORK with individuals who share your interests.

DISCOVER new developments in science.

LEARN about cutting-edge research.

Expanded Program



AAAS Annual Meeting and Science Innovation Exposition 14-19 February 2002 · Boston MA

AAAS: Where All of Science Meets www.aaasmeeting.org



Program Committee

2002 AAAS Annual Meeting Program Committee

Peter H. Raven Missouri Botanical Garden 2002 Program Committee Chair

Floyd Bloom Scripps Research Institute 2003 Program Committee Chair

Dorothy F. Bainton University of California– San Francisco

John I. Brauman Stanford University

Charles Clark National Institute of Standards and Technology

France A. Córdova University of California– Santa Barbara

William Coyne 3M Company (Retired) John L. King University of Michigan

Joanne L. Miller Northeastern University

John H. Moore University of Florida

Jean E. Taylor Rutgers University

George M. Woodwell Woods Hole Research Center

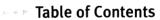
Local Co-chairs

Charles Vest President, Massachusetts Institute of Technology

Edith L. Dabney* Chair, Board of Trustees, WGBH

Daniel P. Burnham President and CEO, Raytheon Company

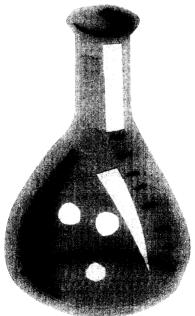
*Invited, not yet confirmed



Welcome from the President of AAAS, Peter Raven
2002 Genome Seminar
2002 Nanotechnolgy Seminar
Plenary and Topical Lectures
Symposia
Career Development Workshops
Student Opportunity
Science Career Fair
General Information
Hotel Reservation Form
Exhibitors
Annual Meeting Advance Registration Form

Information as of 09/18/01.

Please visit our Web site at www.aaasmeeting.org for the latest updates.





Welcome

October, 2001

The world is changing very rapidly, and issues of globalization affect every area of human thought, certainly including science and technology. How shall we best move into a secure and sound future, in which scientists and engineers can contribute fully?

The 2002 AAAS Meeting will bring together an exceptional array of speakers addressing some of the most crucial and timely areas of science, technology, and engineering. Our theme, *Science in a Connected World*, recognizes the rapidly changing global community of which we are a part and the many challenges ahead. It will provide a wide examination of challenges and opportunities for us all.

New this year is a fully redesigned Web site for the Annual Meeting, **www.aaasmeeting.org**. There you will find the latest information on the meeting program and speakers, as well as links to registration, housing, and other meeting events and activities.

On behalf of the AAAS Board and Annual Meeting Program Committee, I urge you to join us in Boston!

Deter H. Raven

Peter Raven President, AAAS Director, Missouri Botanical Garden

MEETING HIGHLIGHTS

PLENARY LECTURES

Lila Gleitman University of Pennsylvania

Ragunath A. Mashelkar Indian Council of Scientific and Industrial Research

Colin Powell* U.S. Secretary of State

Peter Raven Missouri Botanical Garden and AAAS President

Larry Smarr

California Institute for Telecommunications and Information Technology and University of California-San Diego

Lawrence Summers* Harvard University

*Invited, not yet confirmed

22 Topical Lectures and More than 130 Symposia

Areas Include:

- Achieving Health in a Connected World
- Brain, Mind, and Behavior
- Communicating Across Boundaries
- Cultural and Social Diversity
- Dealing With Global Change
- Environmental and Biological Diversity
- Governing Science and Science in Government
- Science and Society
- Science, Engineering, and Public Policy
- Science and the Public Trust
- Science and Sustainability
- Teaching, Learning, and Careers
- Visualizing and Looking Beyond Earth
- Science Innovation: Physical Science & Engineering

Two Exciting Seminars

- Genomes Around Us: What Are We Learning?
- Nanotechnology: From Computer Electronics to Medicine

Poster Sessions

Career Development Workshops *Science* Career Fair Exhibition Hall

Seminars

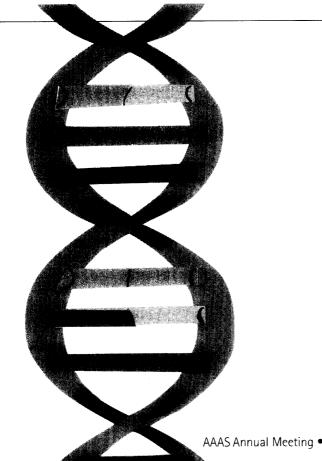
2002 GENOME SEMINAR Genomes Around Us: What Are We Learning?

Saturday, February 16 Sunday, February 17 9:00AM-6:00PM 9:00AM-6:00PM

Organized by: J. Craig Venter, Celera Genomics, Claire Fraser, The Institute for Genomic Research, Barbara Jasny, Science Magazine

The 2002 Genome Seminar is cosponsored by AAAS, *Science* Magazine and The Institute for Genomic Research (TIGR)

The completion of a draft sequence of the human genome has heightened awareness of the vast potentials for genomic studies. As information accumulates about an increasing variety of organisms in the natural world, humans in particular, and an array of diseases and disease processes, our knowledge will continue to expand. This annual seminar brings together leading researchers who will examine the many avenues for study that expand our greater understanding of human and other genomes. Areas to be addressed include new ways of using genomic information, the genome and society, genomics and developing countries, genomes and food, and the many "genomes around us."



Saturday, February 16 9:00AM-12:00NOON SPEAKERS W. Ford Doolittle, Dalhousie University Genomic Structure and Function Steve Benner, University of Florida Genomes and the Geologic Record Michael Snyder, Yale University Proteomics Adam Arkin,* Stanford University Genomic Networks Genome and Society 3:00PM-6:00PM Saturday, February 16 SPEAKERS J. Craig Venter, Celera Genomics Race, Genomics, and Medicine Eugenie Scott, National Center for Science Education Genomics and the Creationism Controversy Arthur Caplan, University of Pennsylvania Medical Center Genome Ethics

Genomics and Developing Countries

New Ways of Using Genomic Information

9:00AM-12:00NOON

3:00PM-6:00PM

SPEAKERS

Vish Nene, The Institute for Genomic Research (TIGR) Theileria parva and Livestock Peter Singer,* University of Toronto Genomics and Public Health Equity Calestous Juma, Harvard University Genomics and the Developing World

Genomes Around Us

Sunday, February 17

Sunday, February 17

SPEAKERS David Botstein,* Stanford University School of Medicine Comparative Genomics James Womak, Texas A&M University The Bovine Genome David Hogness, Stanford University School of Medicine Drosophila Microarrays

PANEL

Steve O'Brien,* NCI; Mel Simon,* Caltech; Elbert Branscomb,* Joint Genome Institute; James Womack, Texas A&M University What Species Shall We Sequence Next?

*Invited, not confirmed

2002 NANOTECHNOLOGY SEMINAR From Computer Electronics to Medicine

Saturday, February 16 Sunday, February 17

12:00NOON-6:00PM 9:00AM-5:00PM

Organized by: Philip Abelson, AAAS and Science Magazine; Charles Clark, National Institute of Standards and Technology; James Ellenbogen, MITRE; John D. Joannopoulos, Massachusetts Institute of Technology; Richard Vallee; University of Massachusetts Medical School

Emerging studies in nanotechnology hold promises to transform many areas of science and engineering. As successor to silicon and other semiconductor devices, nanoscale materials promise another computing revolution. This annual seminar will examine this exciting and rapidly expanding area of research. Speakers will address the impacts and applications in the broad area of nanoelectronics and nanoelectronic devices.

Research in the next 50 years promises another transformation as the electron is replaced by the light, in the form of photons, as a carrier of information. The key to achieving this are photonic crystals, which allow high control of confinement and propagation of light at very small dimensions, enabling design and integration of a wide array of optical nanodevices on a single chip. This very significant area of study is the subject of the second part of the seminar.

Molecular motor proteins enable nanometer-scale movements, which serve as the basis for most forms of biological movement. Several of these proteins have been implicated in human disease, while others represent novel pharmacological targets. Understanding of motor protein mechanics has led to nanomotors for nanofabricated devices for a variety of potential uses. This final portion of the seminar will examine the role of motor proteins in human disease, as subjects for single molecule analysis, and as tools in the design of nanomachines.

New discoveries...

The sequencing of the human genome and emerging studies in nanotechnology are not the end but the beginning of anew era of research. Don't miss out on this year's discoveries and issues-sign up today!

Thursday, February 14

muisuay, reviuary 14	
Welcome	12:30PM
Philip Abelson, AAAS and Science Magazine	2
Keynote Address	12:40PM
Charles Lieber, Harvard University	
SESSION 1:	
Nanoelectronics	2:00PM-6:00PM
MODERATOR	
James Ellenbogen, Mitre	
SPEAKERS	
Paul S. Weiss, Penn State University	
Mark A. Ratner, Northwestern University	
Marc Kastner, Massachusetts Institute of Te	chnology
	chnology
Marc Kastner, Massachusetts Institute of Te	chnology
Marc Kastner, Massachusetts Institute of Te	chnology
Marc Kastner, Massachusetts Institute of Te	chnology
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft	chnology
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2:	
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15	chnology 8:30AM-12:40NOON
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics	8:30AM-12:40NOON
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR	8:30AM-12:40NOON
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR	8:30AM-12:40NOON
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR John Joannopoulos, Massachusetts Institute SPEAKERS Shanhui Fan, Stanford University	8:30AM-12:40NOON
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR John Joannopoulos, Massachusetts Institute SPEAKERS Shanhui Fan, Stanford University	8:30AM-12:40NOON
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR John Joannopoulos, Massachusetts Institute SPEAKERS Shanhui Fan, Stanford University Shawn-Yu Lin, Sandia National Laboratory Sajeev John, University of Toronto	8:30AM-12:40NOON e of Technology
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR John Joannopoulos, Massachusetts Institute SPEAKERS Shanhui Fan, Stanford University Shawn-Yu Lin, Sandia National Laboratory Sajeev John, University of Toronto Axel Scherer, California Institute of Techno	8:30AM-12:40NOON e of Technology
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR John Joannopoulos, Massachusetts Institute SPEAKERS Shanhui Fan, Stanford University Shawn-Yu Lin, Sandia National Laboratory	8:30AM-12:40NOON e of Technology
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR John Joannopoulos, Massachusetts Institute SPEAKERS Shanhui Fan, Stanford University Shawn-Yu Lin, Sandia National Laboratory Sajeev John, University of Toronto Axel Scherer, California Institute of Techno	8:30AM-12:40NOON e of Technology logy ology
Marc Kastner, Massachusetts Institute of Te Cees Dekker, Technical University, Delft Friday, February 15 SESSION 2: Nanophotonics MODERATOR John Joannopoulos, Massachusetts Institute SPEAKERS Shanhui Fan, Stanford University Shawn-Yu Lin, Sandia National Laboratory Sajeev John, University of Toronto Axel Scherer, California Institute of Techno Yoel Fink, Massachusetts Institute of Techno	8:30AM-12:40NOON e of Technology logy ology

SESSION 3:

2:00PM-6:10PM Molecular Motors & Bionanotechnology MODERATOR

Charles Clark, National Institute of Standards and Technology

SPEAKERS

Michael Fisher, University of Maryland Bernard Yurke, Bell Laboratories Richard Vallee, University of Massachusetts Medical School Howard Berg, Harvard University Nadrian Seeman, New York University Carlo Montemagno, Cornell University

Lectures

PLENARY LECTURES

Thursday, February 145:00PMStudent Science Convocation

American Junior Academy of Sciences' Poster Displays

Thursday, February 146:30PMAAAS President's Lecture and Reception

Peter Raven Missouri Botanical Garden and AAAS President

Friday, February 15	6:30PM
Lawrence Summers*	
Harvard University	

6:30PM

0:30PM	
ormation California-	
6:30PM	
9:00AM	

Monday, February 18

Ragunath A. Mashelkar

Indian Council of Scientific and Industrial Research

TOPICAL LECTURES

Friday, February 15

- Morning Lectures 8:00AM-8:45AM
 Katherine High, University of Pennsylvania School of Medicine and Children's Hospital of Philadelphia Gene Transfer for Genetic Disease: Hemophilia
- Gene Transfer for Genetic Disease: Hemophilia as a Model for Prospects and Problems
- Harold Shapiro*, Princeton University Bioethics

■ Special Lecture 12:45PM-1:30PM

Dean Kamen, DEKA Restoration & Development Corporation Innovation and Education

1:30PM-2:15PM

Afternoon Lectures

GEORGE SARTON AWARD LECTURE IN THE HISTORY AND PHILOSOPHY OF SCIENCE Loren Graham, Massachusetts Institute of

Technology Russian Basic Science: Changes Since the Collapse of the Soviet Union and the Inmpact of International Support

May R. Berenbaum, University of Illinois Insects

Margaret Murnane, JILA University of Colorado Can We Make Atoms Sing and Molecules Dance? Using Fast Light Pulses to Observe and Control Nature

Saturday, February 16

 Morning Lectures 8:00AM-8:45AM
 Denis LeBlanc, U.S. Geological Survey Science and the Billion-Dollar Groundwater Cleanup at the Massachusetts Military Reservation
 Wolfgang Ketterle, Massachusetts Institute of

Sector Wolfgang Ketterle, Massachusetts Institute of Technology

- Bose-Einstein Condensates: Matter Made of Matter Waves
- Carl Pomerance, Bell Laboratories Prime Numbers and Cryptography

Afternoon Lectures 2:00PM-2:45PM

2002 John P. McGovern Award Lecture in the Behavioral Sciences

Lawrence Weiskrantz, University of Oxford In and Out of Mind

Evan Hadingham, WGBH/NOVA Science Television--What Works and What Doesn't

Shirley Jackson, Rensselaer Polytechnic Institute

Seric Lander*, Massachusetts Institute of Technology

Sunday, February 17

 Morning Lectures 8:00AM-8:45AM
 Calestous Juma, Harvard University Sustainability and Technical Change: Developing Country Perspectives

Maria Spiropulu, The Enrico Fermi Institute In Search of Extra Dimensions

- Special Lecture 1:00PM-1:45PM
- Edward M. Kennedy*, United States Senate Health Care Issues

■ Afternoon Lectures 2:00PM-2:45PM

Gretchen Daily, Stanford University New Frontiers in Conservation

Ronald T. Kadish*, Ballistic Missile Defense Organization

József Pálinkás, Ministry of Education and University of Debrecen, Hungary

Justin Rattner*, Intel Microprocessor Research Laboratory

Monday, February 18

■ Afternoon Lectures 2:00PM-2:45PM Khotso Mokhele, National Research Foundation, South Africa

Science, Democracy, and Development

Paul C. Sereno, University of Chicago Large Dinosaurs

Virginia Valian, Hunter College and the CUNY Graduate Center Why So Slow? The Advancement of Women

Science Innovation Lectures
 *Invited, not confirmed

Symposia

Achieving Health in a Connected World

Dietary Flavonoids: Heart-Healthy Nutrients or an Excuse to Enjoy Wine and Chocolate?

Friday, February 15 9:00AM-12:00NOON Organized by: John W. Erdman Jr., University of Illinois; Bernard Chaitman, St. Louis University School of Medicine

The Present State of Genomic Medicine

Friday, February 15 2:30PM-5:30PM Organized by: Jeffrey Drazen, New England Journal of Medicine; Francis S. Collins, National Center for Human Genome Research, National Institutes of Health

Environmental Estrogens and Women's Health

Friday, February 15	2:30PM-5:30PM
Organized by: Nancy Reame,	University of Michigan

Dental Cavities: A New Look at an Old Problem

Saturday, February 16 8:45AM-10:15AM Organized by: Marc W. Heft, University of Florida

Scientific & Ethical Perspectives on the Risks of HIV/AIDS Therapeutics

Saturday, February 16 9:00AM-12:00NOON Organized by: Rochelle Diamond, National Organization of Gay and Lesbian Scientists and Technical Professionals, California Institute of Technology; Stephanie J. Bird, Massachusetts Institute of Technology New Drugs for Cytomegalovirus Infections in Birth Defects and AIDS

Saturday, February 16 2:45 PM-4:15 PM Organized by: John C. Drach, University of Michigan

The Many Facets of Aging Research

Saturday, February 16 3:00PM-6:00PM Organized by: Kelly LaMarco, AAAS's Science of Aging Knowledge Environment; Huber Warner, National Institute on Aging

Challenges for Meta-Analysis to Connect Disparate Health Care Evidence

Saturday, February 16 3:00PM-6:00PM Organized by: Ingram Olkin, Stanford University

The Science Underlying Complementary and Alternative Medicine

Sunday, February 17 9:00AM-12:00NOON Organized by: Stephen E. Straus, National Institutes of Health; Donald J. Krogstad, Tulane University; Sondra Schlesinger, Washington University School of Medicine

Winning the War on Cancer in the Post-Genomic Era

Monday, February 18 9:30AM-12:30PM Organized by: Kevin Davies, Cell Press

Stem Cell Biology: From Basic Research to Clinical Opportunity

Monday, February 18 10:00AM–1:00PM Organized by: Laura Grabel, Wesleyan University

Nutritional Interventions for Cancer Survivors Tested in Clinical Trials

Monday, February 18 2:45PM-4:15PM Organized by: R. Jean Hine, University of Arkansas for Medical Sciences

Alzheimer's Disease Pathogenesis, Diagnosis, and Therapeutics

Tuesday, February 198:00AM-11:00AMOrganized by: Rudolph E. Tanzi, MassachusettsGeneral Hospital

Brain, Mind, and Behavior

Avian Cognition: When Being Called "Bird Brain" Is a Compliment

Friday, February 15 9:00AM-12:00NOON Organized by: Irene M. Pepperberg, Massachusetts Institute of Technology; Russell P. Balda, Northern Arizona University

The Prefrontal Cortex and Cognition: New Insights into Willful Behavior

Friday, February 15 9:00AM-12:00NOON Organized by: Earl Miller, Massachusetts Institute of Technology

Rethinking the Role of Affiliation and Aggression in Primate Groups

Friday, February 15 2:15PM-3:45PM Organized by: Robert W. Sussman, Washington University; Karen B. Strier, University of Wisconsin

The Biology of Consciousness

Friday, February 152:30PM-5:30PMOrganized by: Chris Frith, University CollegeLondon

Images of Mind: Understanding How the Brain Enables Cognition

Saturday, February 16 9:00AM-12:00NOON Organized by: Randy L. Buckner, Washington University, Howard Hughes Medical Institute

Language and Brain: Electrophysiology and Imaging Rewrite Aphasia-Based Models

Saturday, February 16 9:00AM-12:00NOON Organized by: Merrill Garrett, University of Arizona; David Caplan, Massachusetts General Hospital

The Cognitive Neuroscience of Mental Imagery

Saturday, February 16 2:45PM-4:15PM Organized by: Stephen Kosslyn, Harvard University

Does the Language We Speak Affect the Thoughts We Think?

Sunday, February 17 9:00AM–12:00NOON Organized by: Susan Goldin-Meadow, University of Chicago; Lila R. Gleitman, University of Pennsylvania

Symposia

How Infants Begin to Learn Words: Cognitive and Perceptual Factors

Sunday, February 17 2:45PM-4:15PM Organized by: Peter W. Jusczyk, Johns Hopkins University

How the Brain Selects Objects and Commands Movement

Sunday, February 17 3:00PM-6:00PM Organized by: Peter Schiller, Massachusetts Institute of Technology

Speaking, Signing, Reading: Brain Systems that Support Language Use

Monday, February 18 9:00AM-12:00NOON Organized by: Philip Rubin, National Science Foundation; Kenneth R. Pugh, Yale University School of Medicine

Reconciling Expressivity and Tractability: Finite-State Methods in Natural Language Analysis

Monday, February 18 9:30AM-12:30PM Organized by: Lawrence S. Moss, Indiana University; Dick Oehrle, Association for the Mathematics of Language

New Neurons in the Adult Brain: Disease, Injury, and Repair

Monday, February 18 3:00PM-6:00PM Organized by: Fred H. Gage, Salk Institute; Jeffrey D. Macklis, Harvard Medical School

Sleep and Memory

Tuesday, February 198:00AM-11:00AMOrganized by: Matthew Wilson, MassachusettsInstitute of Technology

Communicating Across Boundaries

The New Computing

Friday, February 15 9:00AM-12:00NOON Organized by: Maureen C. Kelly, Haddonfield, NJ; Rolf M. Sinclair, Chevy Chase, MD

The New Biology of Rocks

Friday, February 15 2:30PM-5:30PM Organized by: Abigail Salyers, University of Illinois-Urbana-Champaign; James T. Staley, University of Washington

Bioconsensus: Bringing Social Choice Theory to Biology

Saturday, February 16 9:00AM-12:00NOON Organized by: Fred Roberts, Rutgers University

Best Practices from Research Scientists Who Communicate with the Public

Sunday, February 17 9:00AM-12:00NOON Organized by: Bruce V. Lewenstein, Cornell University; Ilan Chabay, The New Curiosity Shop

Mathematical Models for Movement and Aggregation of Cells and Organisms

Sunday, February 17 3:00PM–6:00PM Organized by: Hans Othmer, University of Minnesota

Accommodating Interdisciplinarity in the

Academic Research Environment Monday, February 18 9:15AM–10:45AM Organized by: Edward Derrick, AAAS

International Trends in the Transfer of Academic Research

Monday, February 18 3:00PM-6:00PM Organized by: Irwin Feller, Pennsylvania State University; Fabio Pammolli, University of Siena

Waves: Patterns and Turbulence

Tuesday, February 198:00AM-11:00AMOrganized by: Walter Craig, McMaster University;Nick Ercolani, University of Arizona

Cultural and Social Diversity

The Archaeology of Modern Human Origins

Friday, February 15 9:00AM–12:00NOON Organized by: Geoffrey Clark, Arizona State University

Interstellar Travel and Multi-Generational Space Ships

Friday, February 15 2:30PM-5:30PM Organized by: Yoji Kondo, NASA Goddard Space Flight Center; John H. Moore, University of Florida



Global Monitoring of World Heritage Sites: Towards a Global Standard

Saturday, February 16 3:00PM-6:00PM Organized by: Janos Jelen, Ministry of Foreign Affairs, Hungary; Diane Evans, NASA/Jet Propulsion Laboratory

Biocultural Insights on the Emerging Worldwide Epidemic of Obesity

Saturday, February 16 3:00PM-6:00PM Organized by: Marquisa LaVelle, University of Rhode Island

Dealing With Global Change

Is Extreme Weather Now Better Understood and Predicted?

Friday, February 15 9:00AM-12:00NOON Organized by: Krishna Ramanujan, Science Systems and Applications Inc., NASA Goddard Space Flight Center

Adaptations of Life on Earth to Solar Ultraviolet Radiation

Friday, February 152:30PM-5:30PMOrganized by: Nina G. Jablonski, CaliforniaAcademy of Sciences; William B. Grant, NASALangley Research Center

Not Enough Sea Lions, Too Many Sharks: Global Warming Signal?

Saturday, February 16 8:45AM-10:15AM Organized by: Vincent Gallucci, University of Washington; Bruce Wright, Environment Alaska

Deciphering the Complex Changes in Global Snow and Ice

Saturday, February 16 3:00PM-6:00PM Organized by: David Robinson, Rutgers University; Krishna Ramanujan, Science Systems and Applications Inc., NASA Goddard Space Flight Center

Climate Change: Integrating Science, Economics and Policy

Sunday, February 17 9:00AM-12:00NOON Organized by: Ronald G. Prinn, Massachusetts Institute of Technology: Richard C. J. Somerville, Scripps Institution of Oceanography, University of California-San Diego

The Big Climate Impact of Tiny Particles

Sunday, February 17 3:00PM-6:00PM Organized by: Yoram J. Kaufman, NASA Goddard Space Flight Center

Integrating Mitigation and Adaptation as Global Climate Change Response Strategies

Monday, February 18 9:30AM-12:30PM Organized by: Thomas J. Wilbanks, Oak Ridge National Laboratory; Michael P. Farrell, Oak Ridge National Laboratory

Environmental and Biological Diversity

Biodiversity Science and Global Research: The International Biodiversity Observation Year

Friday, February 15 9:00AM-12:00NOON Organized by: Diana H. Wall, Colorado State University; Andrew Dobson, Princeton University

Community-Based and Sustainable Marine Resource Management: Incentives and Institutions

Friday, February 159:00AM-12:00NOONOrganized by: Fiorenza Micheli, StanfordUniversity; Rafe Sagarin, Stanford University; JuliaNovy Hildesley, World Wildlife Fund

Restoring the Richness of the Seas: Historical Data—Unrealized Potentials

Friday, February 152:30PM-5:30PMOrganized by: Jeremy Jackson, University of
California-San Diego

Deep-Sea Biodiversity: Pattern, Scale and Conservation

Saturday, February 16 9:00AM-12:00NOON Organized by: Michael Rex, University of Massachusetts-Boston

Biodiversity Survival in Modern Habitats

Saturday, February 16 3:00PM-6:00PM Organized by: Cynthia M. Beall, Case Western Reserve University; Catherine Badgley, University of Michigan

Wild Lands and Wildlife Conservation in the Americas

Sunday, February 17 9:00AM-12:00NOON Organized by: Marina Ratchford, AAAS; Mahabir Gupta, Interciencia Association

New Technologies Make Marine Reserves Imperative

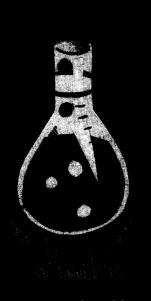
Sunday, February 17 9:00AM-12:00NOON Organized by: Charles Birkeland, Hawaii Cooperative Fishery Research Unit; Callum Roberts, Harvard University

The Census of Marine Life: Challenges in Biodiversity

Sunday, February 17 3:00PM-6:00PM Organized by: Ronald O'Dor, Consortium for Oceanographic Research and Education; Cynthia J. Decker, Consortium for Oceanographic Research and Education; J. Frederick Grassle, Rutgers University

Habitat Conservation Plans and Endangered Species: Will They Survive?

Sunday, February 17 3:00PM-6:00PM Organized by: Juan Valera-Lema, Austin Parks and Recreation



Don't Miss This Opportunity!

Heat up Your Career! Career Development Workshops

Presenting Science to the Public

Time & Date to be announced

Organized by Carol L. Rogers, University of Maryland-College Park and Paul Raeburn, Business Week

Interviewing Skills for Scientists

Monday, F	ebruary	18
-----------	---------	----

Organized by Lisa M. Kozlowski, *Science* Magazine's Next Wave and Karen Horting, *Science* Magazine

AAAS Fellowship Programs in Science Policy and the Mass Media

Sunday, February 17 9:00AM-12:00NOON Organized by Claudia J. Sturges and Judy Kass, AAAS

See www.aaasmeeting.org for schedule updates!

Managing and Effective Job Search

Monday, February 18 1:00PM-4:00PM

Organized by Jura Viesulas, American Chemical Society

Distilling Gets Top Billing: Crafting Better Short Science Stories

Time & Date to be announced

Organized by Eliene Augenbraun, ScienCentral, Inc. and Victoria McGovern, Burroughs Wellcome Fund

Signs of Intelligible Life in the Scientific Community

Time & Date to be announced

Organized by Joanne Locke, Food and Drug Administration, Lily Whiteman, U.S. Mint

4:30PM-6:00PM

Symposia

Evo-Devo: Reuniting Evolution and Development

Monday, February 18 9:30AM-12:30PM Organized by: Ann Campbell Burke, Wesleyan University

Genomic Approaches to Evolutionary Questions

Monday, February 18 3:00PM-6:00PM Organized by: Kevin Davies, Cell Press; Geoffrey North, Current Biology

Organogenesis, De Novo or De Ovo?

Monday, February 18 3:00PM-6:00PM Organized by: Pamela J. Hines, AAAS and Science Magazine; Beverly A. Purnell, AAAS and Science Magazine

Governing Science and Science in Government

Low Dose Radiation: Science, Ethics and Communication Shaping Public Policy

Friday, February 15 9:00AM-12:00NOON Organized by: Sharon M. Friedman, Lehigh University; Antone Brooks, Washington State University-Tri-Cities; JoAnn M. Valenti, Brigham Young University

Inroads to Scientific Reform and Cooperation with Russia

Friday, February 152:30PM-5:30PMOrganized by: Elizabeth J. Kirk, AAAS; GersonSher, US Civilian Research and DevelopmentFoundation

Coping with Complexity: Managing the Academic Research Enterprise

Saturday, February 16 9:00AM-12:00NOON Organized by: J. Scott Hauger, AAAS; Edward Derrick, AAAS

Stewardship of Digital Scientific Information: Challenge and Opportunity

Sunday, February 17 9:00AM-12:00NOON Organized by: Clifford A. Lynch, Coalition for Networked Information

Good Performance Indicators Do Not Grow on Trees

Sunday, February 17 9:00AM-12:00NOON Organized by: Susan E. Cozzens, Georgia Institute of Technology

Intellectual Property, Pharmaceuticals, and Human Rights

Monday, February 18 9:30AM-12:30PM Organized by: Audrey R. Chapman, AAAS; M. Gregg Bloche, Georgetown University

Patenting, Science and the Public Interest

Monday, February 18 3:00PM-6:00PM Organized by: Carolyn Deere, The Rockefeller Foundation; Audrey R. Chapman, AAAS

Science and Society

Show Me the Data: Fiascos in Modeling and Statistics

Friday, February 159:00AM-12:00NOONOrganized by: Leon H. Seitelman, University of
Connecticut

Living in Cities: Engineering and Infrastructure

Friday, February 152:30PM-5:30PMOrganized by: George Bugliarello, PolytechnicUniversity

Questioning Authorities: Lessons in Pursuing Oral Histories of Science

Saturday, February 16 9:00AM-12:00NOON Organized by: Amy Crumpton, AAAS

Understanding the Neuronal Basis of Behavior: Prospects and Societal Impact

Saturday, February 16 3:00PM-6:00PM Organized by: Emilie Marcus, Neuron; Kenneth Blum, Neuron; Katja Brose, Neuron

Behavioral Genetics: What We Know, and How We Know It

Sunday, February 17 9:00AM-12:00NOON Organized by: Elving Anderson, University of Minnesota; Audrey R. Chapman, AAAS



Social and Ethical Implications of Behavioral Genetics Research

Sunday, February 17 2:45PM-4:15PM Organized by: Audrey R. Chapman, AAAS; Elving Anderson, University of Minnesota

The Science of Ice Cream

Sunday, February 173:00PM-6:00PMOrganized by: Albert H. Teich, AAAS; Jill H. Pace,American College of Real Estate Lawyers

Language-Learning Disorders and Delinquency: Is There a Link?

Sunday, February 17 4:30PM-6:00PM Organized by: Nicolas Linares-Orama, The FILIUS Institute-University of Puerto Rico; Sharon E. Moss, American Speech-Language-Hearing Association

Have Your Say: A Town Meeting on Behavioral Genetics

Sunday, February 17 4:30PM-6:00PM Organized by: Jonathan Beckwith, Harvard Medical School; Rachel J. Gray, AAAS

The U.S. Population: How Many of Us Are There?

Monday, February 18 3:00PM-6:00PM Organized by: Robert E. Fay, Census Bureau

Science Around the World: Are International Institutions Working?

Monday, February 18 3:00PM-6:00PM Organized by: Kurt Pawlik, International Social Science Council

Science, Engineering, and Public Policy

The Future of Personal Use Vehicles in China

Friday, February 15 9:00AM-12:00NOON Organized by: Michael Greene, National Research Council

Can Science Better Serve Society's Needs and Remain Creative?

Friday, February 152:30PM-5:30PMOrganized by: Lewis M. Branscomb, HarvardUniversity John F. Kennedy School of Government

Bridging the Gap from Scientific Discovery to Economic Growth

Saturday, February 16 9:00AM-12:00NOON Organized by: Lewis M. Branscomb, Harvard University John F. Kennedy School of Government

Human Population and Freshwater Resources: Science, Policy and Public Outreach

Saturday, February 16 3:00PM-6:00PM Organized by: Vicky Markham, Center for Enviroment and Population; Karin Krchnak, National Wildlife Federation; Nancy Thorne, Population Research Center

Restructuring Electricity Deregulation: Consumers, Suppliers, and Utilities

Sunday, February 17 9:00AM-12:00NOON Organized by: Jose B. Cruz Jr., Ohio State University

Animal Parts for Humans? Xenotransplantation Science, Ethics, Policy and Publics

Sunday, February 17 3:00PM-6:00PM Organized by: Edna F. Einsiedel, University of Calgary

Revisiting Nuclear Power for the Energy Crisis

Sunday, February 17 3:00PM-6:00PM Organized by: Virginia G. Carson, Chapman University; W. Carl Gottschall, Consultant

Ballistic Missile Defense: Freedom from Intimidation or Shield of Dreams?

Monday, February 18 9:30AM-12:30PM Organized by: Stephen I. Schwartz, Bulletin of the Atomic Scientists

Recent Innovations in the Science of Underground Development

Monday, February 18 3:00PM-6:00PM Organized by: Andrew F. McKown, Haley & Aldrich, Inc.; Daniel L. Chess, International Business Machines Corporation

Science and the Public Trust

Biotechnology Policy in Europe and North America: A Roundtable Discussion

Friday, February 152:30PM-5:30PMOrganized by: Susanna Hornig Priest, Texas A&MUniversity

What Message Is Science Sending— And How?

Sunday, February 17 3:00PM-6:00PM Organized by: Eliene Augenbraun, ScienCentral, Inc.; Daryl Chubin, National Action Council for Minorities in Engineering, Inc.

The Politics of Human Participants for the Social and Behavioral Sciences

Monday, February 18 11:00AM-12:30PM Organized by: Rachelle D. Hollander, National Science Foundation

Science, Technology and Society:

Public Participation in Decision-MakingMonday, February 1811:00AM-12:30PMOrganized by: Jill Chopyak, The Loka Institute;Khan Rahi,The Loka Institute

Science and Sustainability

The Farm Crisis: How the Heck Did We Get Here?

Friday, February 15 9:00AM-12:00NOON Organized by: Albert G. Medvitz, McCormack Sheep and Grain

The Search for a Common Future: Communicating about Global Sustainability

Friday, February 154:00PM-5:30PMOrganized by: Rachelle D. Hollander, NationalScience Foundation; Clark Miller, University ofWisconsin

Fisheries-Induced Changes in Marine Ecosystems

Saturday, February 16 9:00AM-12:00NOON Organized by: Daniel Pauly, University of British Columbia

Agricultural Biotechnology: Looking Back and Looking Forward

Saturday, February 16 9:00AM-12:00NOON Organized by: John Foster, University of Nebraska

Restoration Ecology and Native Environments: Challenging Realities Provoke Changing Perspectives

Saturday, February 16 3:00PM-6:00PM Organized by: Mark Davis, Macalester College

Science and Technology for a Transition Toward Sustainability

Sunday, February 17 9:00AM-12:00NOON Organized by: William C. Clark, Harvard University, John F. Kennedy School of Government; Pamela A. Matson, Stanford University

Physical Science and Technology in International Development

Sunday, February 17 3:00PM-6:00PM Organized by: John M. Malin, American Chemical Society; Irving A. Lerch, American Physical Society

Science and Democracy: Citizen's Consensus Conferences and Genetically Modified Foods

Monday, February 18 9:15AM–10:45AM Organized by: Steven B. Katz, North Carolina State University

Sustainable Agriculture in the Developing World: Innovative Examples

Monday, February 18 9:30AM–12:30PM Organized by: Suteera Nagavajara, AAAS; Marina Ratchford, AAAS

Transforming Markets and Technological Systems for Environmental Sustainability

Monday, February 18 3:00PM–6:00PM Organized by: Loren Lutzenhiser, Washington State University

Teaching, Learning, and Careers

Living with Data: Achieving Quantitative Literacy

Friday, February 158:45AM-10:15AMOrganized by: Lynn A. Steen, St. Olaf College

Women in Science: Shattering the Glass Ceiling

Friday, February 15 9:00AM-12:00NOON Organized by: Saeqa Dil Vrtilek, Harvard-Smithsonian Center for Astrophysics; Gerhard Sonnert, Harvard University

Articulation in Mathematics: Smoothing the Bumps from School to College

Friday, February 1510:30AM-12:00NOONOrganized by: Bernard L. Madison, MathematicalAssociation of America and University of Arkansas

Symposia

A New Look at Barbara McClintock and Rosalind Franklin

Friday, February 15 2:15PM-3:45PM Organized by: Margaret Rossiter, Cornell University

Discipline-Based Education Research in Science and Mathematics

Friday, February 15 2:30PM-5:30PM Organized by: Lillian C. McDermott, University of Washington

Mathematics and Science of Origami: Visualize the Possibilities

Friday, February 152:30PM-5:30PMOrganized by: Patricia Wang-Iverson, Research for
Better Schools

Primary School Science Education

Saturday, February 16 9:00AM-12:00NOON Organized by: Leon M. Lederman, Illinois Math Science Academy

Testing and University Admissions

Saturday, February 16 9:00AM-12:00NOON Organized by: Thomas J. Tighe, University of South Florida; Claude M. Steele, Stanford University

Challenges for Medical Education in the 21st Century

Saturday, February 16 3:00PM-6:00PM Organized by: Kenneth M. Ludmerer, Washington University School of Medicine; Sondra Schlesinger, Washington University School of Medicine

Seamless K-16 Science Education

Saturday, February 16 3:00PM-6:00PM Organized by: Leon M. Lederman, Illinois Math Science Academy; Marjorie Bardeen, Fermilab

Advanced Science and Math in American High Schools

Sunday, February 17 9:00AM-12:00NOON Organized by: Jerry P. Gollub, Haverford College

Science is Fun!

Sunday, February 17 3:00PM-6:00PM Organized by: Bassam Z. Shakhashiri, University of Wisconsin-Madison

Academic Excellence: The Role of Undergraduate Participation in Research

Monday, February 18 9:30AM-12:30PM Organized by: Robert L. Lichter, Camille and Henry Dreyfus Foundation; Michael Doyle, Research Corporation

Gender in Science, Mathematics and Engineering Faculty Hiring and Retention?

Monday, February 18 3:00PM-6:00PM Organized by: Alice M. Agogino, University of California-Berkeley; Shirley M. Malcom, AAAS

The Mouth as a Laboratory: Lessons for Teachers

Monday, February 18 3:00PM-6:00PM Organized by: Marc W. Heft, University of Florida

The Impact of Undergraduate Participation in Research: What Is Known?

Monday, February 18 3:00PM-6:00PM Organized by: Robert L. Lichter, Camille and Henry Dreyfus Foundation

Graduate Education: What for?

Tuesday, February 198:00AM-11:00AMOrganized by: James C. Tsang, IBM T.J. WatsonResearch Center; Aparna V. Huzurbazar,University of New Mexico

Student + Volunteer = FREE ADMISSION

You do the math! If you want to attend the AAAS Annual Meeting for FREE and are a Junior, Senior or Graduate Student, simply volunteer as a Session Aide. It's as easy as π !

For Complete Meeting Details and Session Aide Applications please visit:

www.aaasmeeting.org/students

Volunteer and receive:

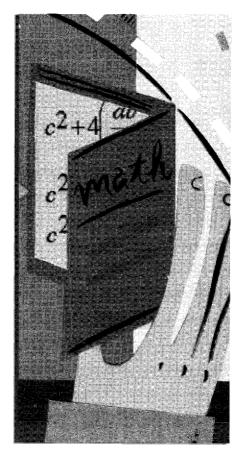
FREE meeting registration includes:

- More than 130 symposia covering 20 different scientific disciplines
- Plenary and Topical Lectures presenting "cutting edge" research
- Special two day in-depth seminars on today's "Hot Topics":
- Genome, Nanotechnology
- Career Development Activities
- Exhibit Hall

FREE poster sessions registration:

A Special Student Award will be given to students demonstrating excellence in each of the designated categories. (Abstract Deadline: November 8, 2001)

FREE one-year subscription to *Science* magazine (see web for details)



Visualizing and Looking Beyond Earth

Visualizing El Niño and How It Influences Society

Saturday, February 16 9:00AM-12:00NOON Organized by: David Halpern, Jet Propulsion Laboratory

Laboratory Astrophysics: Insights on Star and Planet Formation

Saturday, February 16 2:45PM-4:15PM Organized by: Martin Harwit, Cornell University; Barrett H. Ripin, Research Applied

Laboratory Astrophysics: Big Things Come in Little Packages

Saturday, February 16 4:30PM-6:00PM Organized by: Barrett H. Ripin, Research Applied; Martin Harwit, Cornell University

Cosmology: Approaching the Fundamental Parameters

Sunday, February 17 9:00AM-12:00NOON Organized by: Jan M. Vrtilek, Harvard-Smithsonian Center for Astrophysics; Martin Harwit, Cornell University

The Challenges and Promise of Global Environmental Monitoring

Sunday, February 17 9:00AM-12:00NOON Organized by: Krishna Ramanujan, Science Systems and Applications Inc., NASA Goddard Space Flight Center

Beyond the Boundaries of Galaxies

Sunday, February 17 3:00PM-6:00PM Organized by: Mark Voit, Space Telescope Science Institute; Daniela Calzetti, Space Telescope Science Institute; Megan Donahue, Space Telescope Science Institute; Michael Hauser, Johns Hopkins University Space Telescope Sciences Center

Images of a Dynamic Earth

Monday, February 18 9:30AM–12:30PM Organized by: Thomas Jordan, University of Southern California; David Simpson, The IRIS Consortium

The Search for Life Beyond the Solar System

Monday, February 18 3:00PM-6:00PM Organized by: Charles Beichman, Jet Propulsion Laboratory; Lee Anne Willson, Iowa State University; Martin Harwit, Cornell University

Visualizing the Sea Floor: Mapping Submarine Landscapes

Monday, February 18 3:00PM-6:00PM Organized by: Deborah R. Hutchinson, USGS-Woods Hole Field Center

Science Innovation: Physical Science and Engineering

Nuclear Matter at the Highest Energies and Densities

Friday, February 152:30PM-5:30PMOrganized by: Samuel Aronson, BrookhavenNational Laboratory

Experiments with Ultracold Atoms

Saturday, February 16 9:00AM-12:00NOON Organized by: Michael D. Crisp, U.S. Department of Energy

Robot Arm Manipulation

Saturday, February 16 3:00PM-6:00PM Organized by: Robert Connelly, Cornell University

Conquering the Light: Quantum Storage, Teleportation and Communication

Saturday, February 16 3:00PM-6:00PM Organized by: Hossein Sadeghpour, Harvard University

Roadmaps for Quantum Computing

Sunday, February 17 9:00AM-12:00NOON Organized by: Charles W. Clark, National Institute of Standards and Technology

Vortex Matter

Sunday, February 17 3:00PM-6:00PM Organized by: Charles W. Clark, National Institute of Standards and Technology



Science Career Fair

Monday, February 18 11:00AM-4:00PM Exhibit Hall B of the Hynes Convention Center

The AAAS *Science* Career Fair is FREE to all candidates. Employers will be <u>on-site</u> in Boston to talk with candidates about the excellent job opportunities in the biotechnology and pharmaceutical industries. Be sure to bring multiple copies of your resume, and feel free to visit with as many employers as you wish. You can also sign up on-site for *Science's* Job Alerts Service, a <u>free</u> e-mail job notification service.

Also Available

Career Development Workshops, conducted by top science development professionals, will be held Saturday– Monday, February 16–18 in the Boston Marriott Copley Place. Passport meeting registration includes access to the workshops, or you can register for just the workshops at a rate of \$15 for AAAS members and \$30 for nonmembers (see registration form).

Employers

For information about recruiting at the *Science* Career Fair, call 202-326-6534.

Sponsored by AAAS and Science magazine

Plan to be there!

General Information

Meeting Location

Meeting events will be located in the Sheraton Boston Hotel, the Boston Marriott Copley Place, and the Hynes Convention Center, all three of which are connected by an enclosed shopping mall. The Sheraton is the Headquarters hotel, the Hynes Convention Center is adjacent to the Sheraton, and the Marriott is a five-minute walk from the Sheraton.

On-Site Registration

Registration will be located in the concourse outside Exhibit Hall A of the Hynes Convention Center.

Hours are as follows:

M
M
M
M

Internet Access Center

The Internet Access Center, located within the AAAS Exhibition, will be open during all exhibition hours. Multiple workstations will be available for attendees to check e-mail or surf the web.

Attend the Meeting!

"Hollywood has the Oscars. Sports has the Olympics. And American science has the annual meeting

of the American Association for the Advancement of Science, the one place where researchers from all disciplines and around the nation gather to trade discoveries and ideas"

- Bill Dietrich, science writer for the Seattle Times

Exhibition

The Exhibition will be located in Exhibit Hall A of the Hynes Convention Center.

Hours are as follows:	
Friday	
February 15	4:00PM-6:30PM
Grand Opening Reception	5:00PM-6:30PM
Saturday–Sunday	
February 16–17	10:00AM-3:00PM
Monday	
February 18	9:00AM-2:00PM

Barrier-Free Environment

Accommodations for persons with disabilities will be provided upon request at all general lectures and sessions. Services include interpreters or real-time captioning for persons who are deaf or hard-of-hearing, audio-taped highlights, and mobility assistance within and outside the conference facilities as needed. In addition, a Resource Room for Persons with Disabilities will be available onsite. If you have special needs due to a disability, please be sure to check the appropriate box on the registration form.

Discount Airfares to Boston

The following co-official airlines are offering discounted airfares to the AAAS Annual Meeting. Seats are limited and some restrictions apply. For details, go to www.aaasmeeting.org and click on General Information. Or call either airline at the toll-free number below and provide the appropriate code number.

US Airways: Call 877-874-7687 (7 days a week, 8:30AM–9:30PM EST) and mention Gold File number: 75172069.

United Airlines: Call 1-800-521-4041 (7 days a week, 7AM–midnight EST) and mention Meeting ID Code: 598BY.

Airport Transportation

For information about transportation from the airport, see www.aaasmeeting.org.

Rental Car Discounts

AAAS members can get discounts with Dollar and Hertz. Information is available at www.aaasmeeting.org.

Hotel Reservation Form

Sign up online at www.aaasmeeting.org

Please use one form per room. Make copies as needed.

1. HOTELS AND RATES:

Meeting events will be located in the Sheraton Boston Hotel, the Boston Marriott Copley Place, and the Hynes Convention Center, all three of which are connected by an enclosed shopping mall. The Sheraton is the Headquarters hotel, the Hynes Convention Center is adjacent to the Sheraton, and the Marriott is a five-minute walk from the Sheraton.

Sheraton Boston Hotel		39 Dalton Street, Boston, MA 02199
AAAS Annual Meeting	Rates:	
Standard room:	\$153 single/\$	173 double
Additional persons:	\$20 each	
Boston Marriott Copley	Place	110 Huntington Avenue, Boston, MA 02116
AAAS Annual Meeting	Rates:	
Standard room:	\$150 single/\$	162 double
Additional persons:	\$20 each	

Please note: All rates are per room, per night and are subject to a 12.45% tax. Rates include a \$4 per night surcharge to help defray the cost of the Hynes Convention Center

2. HOW TO MAKE RESERVATIONS:

Do not contact the hotels directly. The special AAAS rates are available only through the AAAS Housing Bureau.

INTERNET	Book your reservation online using the interactive site at www.aaasmeeting.org	
TELEPHONE		AAAS Housing Bureau at: 866-254-1080 (toll free) 312-396-2122 (international) 9:00ам-8:00рм EST, Monday-Friday

FAX Send a completed form (one copy per room) to 312-705-2562

3. RESERVATION INFORMATION:

ARRIVAL DATE	
DEPARTURE DATE	
HOTEL SELECTION	First Choice
	Second Choice
ROOM TYPE	Number of people in room
	Number of beds in room: \Box one \Box two
SPECIAL REQUEST	·
Smoking Non-Sm	oking
Check here if you have	special needs due to a disability.
List all additional room oc	cupants: (specify if occupant is a child under age 18)
1	
2	
Hotels will assign sn	erific room types upon check-in based upon

Hotels will assign specific room types upon check-in, based upon availability. Please be advised that requests are <u>not</u> guaranteed.

Deadline: 15 January 2002

4. DEPOSIT INFORMATION:

>>> A deposit of \$200.00 is required with each reservation request.

Housing forms without a valid credit card will be returned and <u>will not be processed</u>. Cash, purchase orders, and wire transfers are not accepted.

□ **Credit Card** – Please be advised that credit cards must be valid through February 2002. Credit card deposits will be charged at the discretion of the hotel holding your reservation on or after January 15, 2002.

TYPE OF CARD	UISA MasterCard	American Express Other
ACCOUNT NUMBER		
EXPIRATION DATE		(Must be valid through 02/02)
NAME ON CARD		

(name as it appears on card)

SIGNATURE

(Cardholder's signature)

□ **Check** – Please mail checks, along with this completed Housing Form, before January 15, 2002. Make checks payable to: Passkey.com/AAAS 2002, PO Box 3191, Boston MA 02241-3191

5. DEADLINE FOR RESERVATIONS:

Reservation requests should be made as soon as possible, but no later than **Tuesday**, **January 15, 2002.** <u>Rooms are assigned on a first-come</u>, <u>first-served basis and may sell out prior to the deadline</u>.

6. CONFIRMATIONS:

A confirmation will be sent after each reservation booking, modification and/or cancellation. **Review it carefully for accuracy.** If you do not receive a confirmation via e-mail, fax, or mail within 7 days after any transaction, please contact the AAAS Housing Bureau at 866-254-1080 (toll-free) or 312-396-2122 (international).

7. CANCELLATION POLICY:

Reservations secured by a credit card and cancelled on or after December 11, 2001, but more than 48 hours prior to arrival, will be assessed a \$15 processing fee. Reservations secured by a check deposit and cancelled more than 48 hours prior to arrival will be assessed a \$15 processing fee. <u>Cancellations made within 48 hours of the confirmed arrival date will result in forfeiture of the entire \$200 deposit.</u>

PRIMARY GUEST INFORMATION

(confirmation will be sent to this guesi	t)	
First Name		Middle Initial
Last Name	1.1	
Company		
Address		
City		
Country		
Phone		
E-mail		

(If outside the USA, please also include country and city codes.)

Send this Form to the AAAS Housing Bureau — DO NOT SEND IT TO AAAS.

Spotlight your company at the AAAS Annual Meeting!

Exhibits and Sponsorships Available – Call Today!

Phone

E-mail

Get your message or image across to those who attend the meeting! Many opportunities are available for exhibitors and sponsors at the 2002 AAAS Annual Meeting, including:

- Exhibit Hall Booths
- Exhibitor Workshops
- Meeting Sponsorships
- Advertising in the 2002 Program/Abstract Book

2002 AAAS Exhibitors as of 09/26/01

Academia Book Exhibits American Speech-Language-Hearing Association Association of American University Presses Brock Optical, Inc. Celera Genomics **CIESIN** at Columbia University Community of Science Cross Ref Exploratorium Geico Direct **Heldref Publications** Howard Hughes Medical Institute ISI Island Press John Templeton Foundation National Academy Press

National Institute of Standards and Technology National Library of Medicine National Science & Technology Medals Foundation National Science Foundation National Sea Grant College Program Nature America, Inc. Nature Publishing Group Reference NOAA Perseus Books Group Subaru of America, Inc. U.S. Civilian Research and Development Foundation University of California Press Vascular Biotech GmbH W.H. Freeman and Company

More Information: For additional

Questions? Contact Kathleen Feehan,

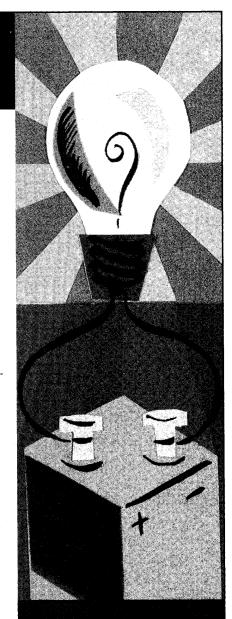
202-326-6736

kfeehan@aaas.org

information, visit our Web site:

AAAS Exhibit Sales Manager

www.aaasmeetings.org



Sign Up Today! www.aaasmeetings.org

MISS A SESSION?

Audiotapes of Recent AAAS Meetings Are Still Available. Tapes of almost all plenary and topical lectures are available for the: 1998 Philadelphia meeting 1999 Anaheim Meeting 2000 Washington, DC Meeting 2001 San Francisco Meeting Hear from speakers such as: Bill Clinton • Michael Crichton • Craig Venter • Francis Collins • William Haseltine • Robert Kirshner • Bill Nye • Harold Varmus • Plus more than 3,400 speakers in over 500 sessions

To order:

10532 Greenwood Avenue North Seattle, WA 98133 Phone (800) 810-TAPE or (206) 440-7989

www.aven.com

Advance Registration Form

>>> Sign up online at www.aaasmeeting.org

Deadline: 4 January 2002

1. Please provide name and address

Name		
Affiliation		
Address		
City		
State	Zip	
Country		
Phone		
Fax		
E-mail Address		
	1. 1.1.	PQRST

□ Check here if you have special needs due to a disability; AAAS will contact you prior to the meeting.

2. Advance Registration Fees (Please check only one)

A. Passport: Unlimited access to all symposia, seminars, topical lectures, career workshops, plenary events and exhibit hall.

	AAAS Member ¹	Non-Member
Professional	\$260	🗆 \$315
Student ¹	□ \$52	🗆 \$79
Postdoc ¹	\$205	🗆 \$253
K-12 Teacher ¹	\$205	🗆 \$253
Emeritus ¹	🗀 \$205	🗆 \$253
	1	

B. Seminar only: Specified seminar plus career workshops, plenary events and exhibit hall only.

Genome Seminar	🗆 \$185	🗆 \$240
Nanotechnology Seminar	🗆 \$185	🗆 \$240

C. One Day Passport: Passport access for one day only.

All Registrants	🗆 \$136	🗆 \$164	
Please specify day:	🗆 Fri 🗆 Sat	🗆 Sun 🗆 Mon/Tue	

D. Career Development only: Career workshops, plenary events and exhibit hall only.

All Registrants 🗆 \$15 🗆 \$30

E. Exhibit Hall only: P	Plenary events and	exhibit hall only.

□ \$0	□ \$0
	□ \$0

NOTE: For registrations received after January 4, onsite rates apply!



3. Member/Special Rate Verification

To qualify for AAAS Member rate, indica AAAS Member Number (8-digit number or your membership card or <i>Science</i> label)	1	
To qualify for student rate, indicate: Expected year of graduation		
Institution		
To qualify for postdoc or K-12 teacher ra Institution	ate, indicate:	
Chair or Principal's name		
To qualify for emeritus rate, indicate: Retirement Year		

4. AAAS Membership Dues (Optional)

If you are not a AAAS member, you can join now by checking the appropriate box below and take advantage of the discounted member registration fees. You will also get a year's subscription (51 issues) to the journal *Science* at the 2001 rate.

Category	USA	Canada	Mexico/Caribbean	International
Professional	🗆 \$115	🗆 \$181.90	🗆 \$170	🗆 \$202
Student	🗆 \$65	🗆 \$128.40	□ \$120	🗆 \$152
Postdoc	🗆 \$ 90	🗆 \$155.15	🗆 \$145	🗆 \$177
K-12 Teacher	🗆 \$ 90	🗆 \$155.15	🗆 \$145	🗆 \$177
Emeritus	🗆 \$85	🗆 \$149.80	🗆 \$140	🗆 \$172

5. Payment Total

Please add the amounts from the box(es) you have checked in sections 2 and 4 and write in the total amount due below:

TOTAL AMOUNT \$ _

□ Check Enclosed (made payable to "AAAS")⁴ □ Original Purchase Order Enclosed Credit Card: □ VISA □ MasterCard □ American Express (No other cards accepted)

Credit Card Number ____

Name on Card _____

Expiration Date _____ Signature ____

6. How to Register

Do <u>NOT</u> mail hard copy if you register via fax, phone or the web.

Fax: (credit card payment only) Fax this form to 202-842-1065

Phone: (credit card payment only) Call 202-326-6450

Web: Use the online registration form at www.aaasmeeting.org

Mail: Send this form to:

Registrar, AAAS Meetings Department 1200 New York Avenue, NW Washington, DC 20005 USA

Important Notes:

- Members, students, postdocs, K-12 teachers, and emeritus must complete the verification information in section 3 to qualify for the special registration rates.
- (2) \$64 of dues plus international postage are allocated to Science. Please allow up to four weeks for receipt of your first issue. Canadian rates include GST #125488122.
- (3) Cancellations must be received in writing by January 4, 2002. No refunds will be made for cancellations received after this date. Refunds are subject to a \$25 processing fee and will be issued after the meeting.
- (4) Checks must be in United States currency and be payable on a United States bank.



Classified Advertising

For full details on advertising rates, deadlines, mechanical requirements, and editorial calendar go to www.sciencecareers.org and click on How to Advertise

UNITED STATES

Display Classified Advertising

Bren Peters (Mid-Atlantic, Midwest) Tel: 202-326-6541

Kathleen Clark (Southeast, Canada) Tel: 202-326-6555

Jill Steinberg (Northeast) Tel: 914-834-8733

Kristine von Zedlitz (West Coast) Tel: 415-956-2531 Fax: 202-289-6742

E-mail: science_displayads@aaas.org

Line Classified Advertising

Jody Fenty Tel: 202-326-6722 Christina Geiger Tel: 202-326-6532 Fax: 202-289-1451 E-mail: science_classifieds@aaas.org

Online Classified Advertising

Beth Dwyer Tel: 202-326-6534 Fax: 202-289-6742 E-mail: bdwyer@aaas.org

www.sciencecareers.org

Ad Materials: Send to: *Science* Classified Advertising, 1200 New York Avenue, NW, Room 911, Washington, DC 20005

EUROPE

Display, Line, and Online Classified Advertising

Deborah Cummings Tel: +44 (0) 1223 326 500 Fax: +44 (0) 1223 326 532 E-mail: european_ads@science-int.co.uk

Ad Materials: Send to: *Science* International, Advertising Dept., Bateman House, 82-88 Hills Road, Cambridge CB2 1LQ, United Kingdom

MEETINGS/ANNOUNCEMENTS

Kathleen Clark Tel: 202-326-6555 Richard Walters Tel: +44 (0) 1223 326 500

To **Subscribe** to *Science* call: 202-326-6417 or 1-800-731-4939

POSITIONS OPEN

ASSISTANT PROFESSOR Ecological Modeling and Geographical Information Systems

The Department of Ecology, Evolution, and Natural Resources (website: http://www.rci.rutgers. edu/~deenr) and the Grant F. Walton Center for Remote Sensing and Spatial Analysis (website: http://www.crssa.rutgers.edu) of Rutgers University seek candidates for an academic-year, tenuretrack position in ecological modeling and GIS. The successful candidate will establish a vigorous, externally funded research program in ecological modeling applied to ecosystem/landscape/spatial ecology or natural resource management and contribute to multidisciplinary research in the New Jersey Agricultural Experiment Station. The candidate will also be expected to teach ecological modeling, GIS, and remote sensing at the undergraduate and/or graduate levels with the opportunity to develop instructional programs in related areas. A Ph.D. in ecology, natural resource management, environmental science, geography, or related fields with significant experience in ecological modeling and GIS is required.

Applicants should submit a description of research interests and teaching qualifications, curriculum vitae, and up to three selected reprints in electronic form (pdf, Word, or ps format) to: Search Committee Chair, Dr. Richard Lathrop; e-mail: lathrop@ crssa.rutgers.edu. Applicants should also have at least three letters of reference sent directly to Dr. Lathrop by e-mail or hard copy. Hard copy may be sent to: Dr. R. Lathrop, Department of Ecology, Evolution, and Natural Resources, 14 College Farm Road, Cook College, Rutgers University, New Brunswick, NJ 08901-8551. For specific questions, please contact Ms. Diane Reed; Tele-phone: 732-932-1104; e-mail: reed@aesop. rutgers.edu. The search committee will begin reviewing applications November 15, 2001, and will continue until the position is filled. A September 1, 2002, starting date is anticipated.

Rutgers University is an Affirmative Action/Equal Opportunity Employer.

Tufts University invites applications for two TEN-URE-TRACK FACULTY POSITIONS beginning September 2002 in the Department of Chemical and Biological Engineering. This year the Department celebrated 100 years of chemical engineering. The celebration also marked the change of the Department's name to Chemical and Biological Engineering, the first such department in the country. This change reflects the growing integration of chemistry, biology, and engineering under the powerful paradigm of chemical engineering and Tufts' commitment to this broadening discipline. The University seeks individuals with exceptional

promise for research achievement and who will develop new courses at the interface of biology and chemical engineering. Candidates proposing research programs in the areas of biomaterials, tissue engineering, metabolic engineering, controlled release, or biocatalysis are of particular interest. Ample opportunities exist for strong interactions with the Bioengineering Center of the School of Engineering and the Medical, Dental, and Veterinary Schools of Tufts. The vibrant biotechnology community in Boston fosters many of these interactions. Outstanding candidates who have completed their Ph.D. degrees in chemical engineering (or a closely related field) and have a strong commitment to research and teaching are encouraged to apply. Screening of applications will begin December 2001, and will continue until the positions are filled. Please send curriculum vitae, publication list, concise description of proposed research, statement of teaching interests and plans, and three letters of recommendation to: Professor Maria Flytzani-Stephanopoulos, Chair, Faculty Search Committee, Department of Chemical and Biological Engineering, Tufts University, 4 Colby Street, Medford, MA 02155. Information on the Department can also be found at website: http://ase. tufts.edu/chemical. Tufts University is an Equal Opportunity/Affirmative Action Employer. We are committed to increasing the diversity of our faculty. Members of underrepresented groups are strongly encouraged to apply.

POSITIONS OPEN

ASSISTANT PROFESSOR OF BIOTECHNOLOGY University of Texas Pan American

The Department of Biology at the University of Texas Pan American invites applications from outstanding candidates for a tenure-track faculty position in biotechnology. Candidates with expertise in eukaryotic molecular biology are encouraged to apply. The University offers new facilities and a supportive, collegial environment to foster development of academic careers. Salary is negotiable based on background and experience.

The successful candidate will be expected to develop an externally funded research program involving eukaryotic molecular biology and to display a commitment to teaching excellence. The candidate is expected to assist in teaching the Department's general biology courses and develop a course or courses in candidate's specialty in molecular biology and biotechnology. Visit our department website: http:// www.panam.edu/dept/biology and the University of Texas Pan American Personnel Department website: http://w3.panam.edu/www/personnel for more information.

Evaluation of applications will begin on December 14, 2001, and all application material must be received by this date. Applicants must hold a Ph.D. or equivalent degree. A letter of application, curriculum vitae, copies of representative publications, a one-page description of future research, a statement of your teaching philosophy, and three letters of recommendation (sent under separate cover) should be addressed to:

Dr. Luis Materon Chair, Search Committee Department of Biology University of Texas Pan American 1201 West University Drive Edinburg, TX 78539-2999 E-mail: Imateron@panam.edu FAX: 956-381-3657 (F01/02-29)

The University of Texas Pan American is an Equal Opportunity Employer.

EVOLUTIONARY BIOLOGIST

The Department of Biology at Emory University is seeking an Evolutionary Biologist who uses modern field, laboratory, or theoretical approaches to study fundamental questions about the process and mechanisms of evolution. The Department will consider applicants from a wide range of specializations including but not limited to evolutionary ecology, conservation/population genetics, experimental evolution, and comparative genomics/bioinformatics. The position is for a tenure-track ASSISTANT PROFES-SOR, although an appointment at a higher rank will be considered in exceptional circumstances. The successful applicant will be provided with competitive start-up funds and research space. Applicants must provide evidence that they will develop a strong, independently funded research program. A commitment to undergraduate teaching is expected and the appointee will also participate in appropriate Ph.D.granting programs of the interdepartmental Graduate Division of Biological and Biomedical Sciences. Applicants should submit curriculum vitae and a statement detailing their current research and future plans and the names and addresses (including email) of three individuals who could be asked for letters of recommendation. Please address applications to: Dr. John C. Lucchesi, EB Search, Department of Biology, Emory University, 1510 Clifton Road, Atlanta, GA 30322. Telephone: 404-727-4234; FAX: 404-727-2880; e-mail: evol_srch@biology.emory.edu. Review of completed applications will begin January 1, 2002. Information on the Biology Department and Emory's graduate programs can be obtained from the following websites: http://www.emory.edu/BIOLOGY/ and http://www.biomed.emory.edu/.

Emory is an Equal Opportunity/Affirmative Action Employer.

Research & Development



What drives you?

We're driven by

isinneine

Be part of the legacy of pharmaceutical innovation at Schering-Plough Research Institute. Since our inception in 1851, we've continued to discover new treatments that extend and enhance the lives of millions around the world. From TRIMETON[®] and GARAMYCIN[®] to INTRON[®] A and CLARITIN[®]. And you could be our next innovator in one of the following exceptional positions at our Kenilworth and Union, NJ locations:

Principal Engineer

You will lead a team of scientists, engineers and operating staff in the development, scale-up and technology transfer of purification processes as well as provide technical support to clinical manufacturing and offshore commercial manufacturing operations. A PhD in biochemical engineering or a related field and 6+ years of relevant experience including a background in GMP manufacturing and compliance are required. Knowledge of protein purification and scale-up principles is necessary. Some travel is also required. **Job Code: PAD/SCJ/SRI/2299HS**

Engineer

You will provide technical support for pilot and commercial-scale microbial (recombinant E. coli) fermentation and recovery operations. This involves reviewing and analyzing production data; developing and implementing new methodologies for monitoring batches; and performing troubleshooting and technical training sessions. A PhD in biochemical engineering and 0-3 years of experience in the process development and scale-up of microbial fermentation processes as well as a background in statistical data analysis for process control and monitoring are required. Excellent problem solving skills are essential. Some travel to offsite facilities is necessary. Job Code: PAD/SCJ/SRI/2281HS

Engineer

You will plan and perform development, scale-up and technology transfer of purification processes as well as provide technical support to clinical manufacturing and offshore commercial manufacturing operations. A PhD in biochemical engineering or a related field and 0-3 years of protein purification and characterization experience are required. Some travel is necessary. Job Code: PAD/SCJ/SRI/2291HS

Associate Engineer

You will perform development, scale-up and technology transfer of purification processes as well as provide technical support to clinical manufacturing and offshore commercial manufacturing operations. Requires a BS in biochemical engineering (or a related field), and 2-4 years of experience or an MS in biochemical engineering (or a related field), and 0-2 years of experience in protein purification and characterization. Some travel is necessary. Job Code: PAD/SCJ/SR1/2292HS

Assistant Engineer

You will provide support to pilot and commercial-scale microbial fermentation and recovery operations. This involves performing lab and pilot scale studies on recombinant E. coli-based processes. A BS in biochemical engineering and 0-2 years of experience in microbial fermentation, recovery and scale-up are required. Background must include statistical experimental design and data analysis as well as experience with bioreactors and recovery equipment. Some travel is necessary. Job Code: PAD/SCJ/SRI/2284HS

Senior Scientist

You will participate in the process development of microbial/mammalian expression systems for the production of biopharmaceutical products. A PhD in molecular biology, microbiology, cell biology or a related field and 0-2 years of postdoctoral experience are required. A background in foreign gene expression in prokaryotic/eukaryotic cell lines is highly desirable. Job Code: PAD/SCJ/SRI/2286HS

Assistant Scientist

You will perform routine bioanalytical assays such as electrophoresis, protein and HPLC assays of recombinant proteins under cGLPs/cGMP. A BS in chemistry or biology and 0-2 years of laboratory experience are required as is knowledge of standard laboratory procedures. PC proficiency (word processing, spreadsheet, windows-based applications) is necessary. Familiarity with electrophoresis, HPLC and protein assays is a plus. Job Code: PAD/SCJ/SR1/2297HS

Assistant Scientist II

You will participate in the development, characterization and scale-up of mammalian cell culture processes for the production of recombinant proteins and viruses. A BS in cell biology, biotechnology (or a related field) and 2-4 years of experience with mammalian cell cultures or an MS with 0-2 years of experience are required. PC proficiency is necessary as are excellent problem-solving skills. A background in cell line characterization and microbial fermentation is highly desirable. Knowledge of cGMP guidelines is preferred. Job Code: PAD/SCJ/SRI/2137HS

Assistant Scientist III

You will collaborate with scientists and engineers in the development and characterization of biotechnology-based processes for the production of therapeutic agents as well as provide technical support for existing and future manufacturing processes. A BS in biology, biochemistry, biotechnology or a related field and 0-2 years of experience in protein purification/ characterization are required. Job Code: PAD/SCJ/SRI/2296HS

Research Associate - GENOMICS - Allergy

You will contribute to genomic research and drug discovery projects in allergic diseases. This involves performing experiments in gene expression, protein purification, enzymatic assay development and compound screening. Qualifications include an MS in biology or a related field and 3+ years of biochemistry or molecular biology lab experience. A background in biochemistry including protein purification, enzymatic assay, HPLC and Western blot is required. Knowledge of recombinant DNA and/or mammalian cell culture techniques is a plus. Job Code: PAD/SCJ/SRI/2240HS

We offer an excellent compensation package including competitive salary, profit sharing, 401(k) plan, and a cash incentive bonus program. Comprehensive benefits include: group insurance and retirement programs, flexible work arrangements, education assistance, and health and wellness programs.

For more information and to apply online, search jobs at *www.whatdrivesyou.com* or mail your resume, referencing job code, to: Schering-Plough c/o Resume Processing, P.O. Box 549248, Suite 187, Waltham, MA 02454-0248. *By responding to this ad, you may be considered for other potential opportunities throughout the Schering-Plough organization. If a potential match exists, you will be notified.* An equal opportunity employer.

Search jobs @_____ www.whatdrivesyou.com



Discovery:

 \bigcirc

One of the world's leading pharmaceutical companies, active in 100 countries

10,000 people dedicated to R&D, with centres of research excellence in the UK, US and Sweden

Over £5 million invested each working day to ensure a flow of new medicines that make a difference



 \bigcirc

Multi-million pound investment in the 70 acre site has created a scientific centre of excellence



the chance to

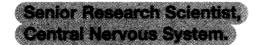
Post-doc positions

Two post-doctoral scientists are required for a 2 year period initially. The placements will be based predominantly at Alderley Park, Cheshire, but will involve training in an academic research department and short periods at other AstraZeneca research sites. One placement is offered to carry out innovative studies in the area of cardiac electrophysiology. The suitable candidate would ideally have significant practical knowledge of electrophysiology, including theoretical/ practical understanding of a range of molecular biological techniques. The second placement is to establish, validate and apply methods of simultaneous assessment of cardiovascular, respiratory and central nervous system side-effects of drugs in the mouse. The suitable candidate would ideally have significant practical knowledge of cardiovascular telemetry techniques in the mouse or rat, and an interest in behavioural and respiratory pharmacology. Self-motivation, as well as good communication and team working skills, will be essential for either placement, in order to collaborate effectively with other parts of the company that can provide significant additional practical and intellectual assistance. Allied to this will be the desire to learn new techniques and initiate publication of the data generated.

Please send a detailed CV to: Julie Nixon, Human Resources, AstraZeneca, Alderley Park, Macclesfield, Cheshire, SK11 900, UK. E-mail: Julie.J.Nixon@astrazeneca.com

Closing date: 9 november

make a difference



Qualifications include a Ph.D. in behavioral or biological sciences, and a minimum of 2-3 years postdoctoral experience is preferred. Expertise in behavioral CNS models and a good publication record is required. The Central Nervous System, Gastrointestinal, Kidney & Transgenics section of the department of General Pharmacology & Animal Care is responsible for conducting state-of-the-art general and safety pharmacology, and for providing general and safety pharmacology input to early discovery projects in the CNS and Pain Control areas, as well as for supporting more mature projects with documentation studies for IND's. The department is certified to Good Laboratory Practice. The individual will be engaged in establishing and characterizing new in vivo models in the CNS area. Good communication and collaboration skills are required and the individual will be expected to write reports and publications.

For more information call: Michael D. B. Swedberg, Ph.D., Associate Director, at +46 8 553 289 63, or e-mail: michael.swedberg@astrazeneca.com.

If you're interested in applying for this role, please quote reference 10-5342 on all correspondence.



 \bigcirc

Experience with behavioral CNS models will be an advantage. The Central Nervous System, Gastrointestinal, Kidney & Transgenics section of the department of General Pharmacology & Animal Care is responsible for providing general and safety pharmacology input to early discovery projects as well as for supporting more mature projects with documentation studies for IND's. The individual will be engaged in establishing and characterizing new in vivo models in the CNS area. Good communication and collaboration skills are required and the individual will be expected to write reports and publications.

For more information call: Michael D. B. Swedberg, Ph.D., Associate Director, at +46 8 553 289 63, or e-mail: michael.swedberg@astrazeneca.com

If you're interested in applying for this role, please quote reference 10-5328 on your correspondence.

Please send your written application marked "Senior Research Scientist Ref. nr 10-5342" or "Post-doc CNS 10-5328" to: AstraZeneca R&D Södertälje, Human Resources, Lili Hofbauer, 151 85 Södertälje, Sweden.

Closing date: 23 November 2001.

A

For further information visit our website at www.estrazeneca.ee



Leading Innovation in World Healthcare

NCC CCCC A Comprehensive Cancer Center Designated by the National Cancer Institute	The Comp position listed belo	hensive Cancer C Aedical Center Boulevard, brehensive Cancer Center is over the next two years w. Attractive start-up fund translational research are interests to th	Winston-Salem, North Ca of Wake Forest University with primary appointments ls, lab space and a collabo	rolina 27157 is recruiting for faculty in the departments prative environment for statement of research
Bi	ochemistry	Cancer Biology	Pathology	Radiation Biology
Assi – X- crys • Assi – Mi mod	tallography istant Professor RI in animal	 Assoc. Prof. – DNA damage and repair Assoc. Prof. – signaling and apoptosis Assist. Prof. – prostate biology Assist. Prof. – molecular biology of natural anti-cancer compounds 	 Assistant or Associate Professor – regulation of apoptosis Assistant or Associate Professor – cell cycle progression 	 Assistant Professor free radical/ radiation biology/oxidative stress Associate Professor free radical/ radiation biology/oxidative stress
	ct: n Gmeiner, Ph.D. ner@wfubmc.edu	Contact: Frank M. Torti M.D. ftorti@wfubmc.edu	Contact: Mark Willingham, M.D. mwilling@wfubmc.edu	Contact: Mike Robbins, Ph.D. mrobbins@wfubmc.edu



Estuarine Ecologist/Oceanographer; Tenure track Assistant, Associate or full Professor, depending upon experience. The School for Marine Science and Technology at the University of Massachusetts Dartmouth seeks applicants who want to develop and direct a Natural Laboratory in Mount Hope Bay (MHB)/Narragansett Bay. The 5-year Natural Laboratory development program involves multidisciplinary research as related to the MHB estuarine ecosystem and fish environment. The Laboratory is a synthesis of data assimilation modeling and field observations and will feature scenario testing. The successful applicant will also be expected to establish related extramurally funded coastal and estuarine research program(s); advise graduate thesis research; and teach graduate level course(s) in marine science and associated scientific disciplines.

Required Qualifications: An earned doctorate in appropriate field and field experience in estuarine research: For Asst. Professor postdoctoral experience and multiple peer-reviewed publications; Assoc. Professor - extensive publication list and record of externally funded research; full Professor - international respected scholarly research record. Preferred Qualifications: Experience in organizing and participating in large-scale estuarine research; synthesis of ecosystem data sets, modeling and/or statistical analysis for assessing estuarine communities or environmental alteration.

Send curriculum vitae and the name, mailing and email addresses and telephone number of four references to: Estuarine Faculty Search, Attn: Wendell S. Brown, Program Chair, School for Marine Science and Technology, University of Massachusetts Dartmouth, 706 Rodney French Blvd., New Bedford, MA 02744. Review of applications will begin November 8, 2001 and continue until the position is filled.

UMD is an AA/EEO Employer.

UNIVERSITY of VIRGINIA

Tenure-Track Faculty Position in the Geochemical Earth-Surface Processes/Environmental Geochemistry

The Department of Environmental Sciences at the University of Virginia invites applications for a tenure-track assistant professor in geosciences. The Department is an interdisciplinary community of process-oriented scientists working in the areas of geosciences, hydrology, ecology, and atmospheric sciences. The Department offers B.A., M.S., and Ph.D. degrees.

The Department seeks candidates with the skills and interest to advance our understanding of geochemical processes in Earth-surface environments. The ideal candidate will embrace the opportunity to work within our interdisciplinary mix of research areas. A Ph.D. in geosciences or related field is required.

The successful candidate will be expected to develop outstanding programs in research and teaching at both the undergraduate and graduate levels and to participate in teaching our undergraduate core course in physical geology. Applicants must show demonstrated excellence in their research and a strong commitment to quality teaching.

Send statements of research and teaching interests, curriculum vitae, and the names and addresses of three references to:

Bruce P. Hayden, Professor and Chair University of Virginia Department of Environmental Sciences 291 McCormick Road, P.O. Box 400123 Charlottesville, VA 22904-4123

Evaluation of applications will begin on 15 November 2001. All applications must be received by 4 January 2002. We especially encourage applications from under-represented groups. For additional information, see the department web site at www.evsc.virginia.edu.

Members of the search committee will be available to talk to interested applicants at the Geological Society of America and the American Geophysical Union meetings.

The University of Virginia is an equal opportunity/ affirmative action employer.

More Than Just Another **Face.**

More Than Just Another **Company.** At Pfizer, you'll always be more than just another face. Because we believe that meeting our goal of saving, extending, and improving people's lives depends on the unique contribution of each of our employees. Whatever your specialty, your skills, knowledge and entrepreneurial spirit will be critical to building our success. So be more than just another face. Join the world's largest pharmaceutical research enterprise, and see the difference one person can make.

he ve

nnovation teamwork

hat matter

er

More Than Just Another Opportunity.

Now is the perfect time to join our team in Ann Arbor. Our tremendous growth means we have a wealth of new openings for scientists who will literally help mold our future. You'll find exceptional opportunities to work on some of the most advanced science in the world with teams that will challenge you to match their ability to think creatively, take risks, and deliver.

You'll also enjoy the friendly yet sophisticated city of Ann Arbor, home to premier educational and medical institutions, celebrated museums, beautiful parks, fine restaurants and year-round recreational activities.

Apply Today

Visit our Online Job Fair at **www.PfizerPharmJobs.com** to learn more about our great opportunities at all levels in Pharmaceutical R&D, including Formulations, Analytical R&D, and Regulatory CMC. Apply today for a chance to see how you can make a difference!

An equal opportunity employer, Pfizer offers a workplace rich with diversity and potential.



Life is our life's work.

www.pfizer.com



UNIVERSITY of NEW HAMPSHIRE **Director Of The University** Instrumentation Center

The UNH University Instrumentation Center (UIC) provides direct and easy access for faculty and other researchers to a wide variety of state-of-the-art instrumentation for analytical and educational purposes. It also serves as a resource for state and regional institutions, agencies, and industries. UIC staff provide expertise in instrumental analysis techniques, maintain and repair the instruments, operate instruments for clients and/or train them in operation, and assist in data analysis. More information is available at http://unhinfo.unh.edu/instrumentation-center/index.html

RESPONSIBILITIES: Reporting to the VP for Research and Public Service, the University Instrumentation Center Director will be responsible for leading an emerging research and teaching oriented service center toward excellence; duties to include working directly with faculty oriented service center toward excellence; duties to include working directly with faculity, administrators, and clients from diverse backgrounds and perspectives to maximize use of facilities within the UIC; forging partnerships with researchers, teaching oriented faculty members, other departments, programs, and research centers and institutes for purposes of proactively supporting research and instruction; managing the financial, administrative, and supervisory aspects of the UIC; supporting education and training of staff, university researchers/clients, and students; securing funding through external and internal sources to obtain new instruments and upgrade existing equipment; promoting UNH's outreach mission by developing knowledge of other laboratories in the state and region for purposes of forming partnerships, referral relationships, and information networks; serving as a resource for state government, business, and industry. as a resource for state government, business, and industry.

QUALIFICATIONS: Advanced degree in physical sciences or engineering. Minimum of three years managerial experience. Demonstrated experience with operation of analytical instruments and application to research problems. Familiarity with securing external funding for scientific instruments. Excellent oral and written communication skills. Demonstrated ability to work with a variety of constituents

SALARY: Competitive and commensurate with experience.

Review of applications will begin immediately and continue until a suitable candidate is selected.

Interested applicants should send a letter of intent, CV/resume, and the names, addresses, and phone numbers of three references to:

Chair, University Instrumentation Center Director Search Committee C/o Office of the Vice President for Research and Public Service Room 107, Thompson Hall University of New Hampshire Durham, NH 03824

UNH is committed to excellence through the diversity of its staff and encourages women and minorities to apply.

VASCULAR BIOLOGY CENTER MEDICAL COLLEGE **OF GEORGIA**

Applications are invited from qualified individuals, with an M.D. and/or Ph.D. degree in a biomedical science, for two tenure-track ASSISTANT PROFESSOR positions in the Vascular Biology Center, http://www.mcg.edu/centers/VBC/index/ html, of the Medical College of Georgia. Individuals interested in molecular mechanisms regulating angiogenesis/ vasculogenesis are particularly encouraged to apply. The successful applicants will establish an extramurally funded research program, and participate in the teaching and training of pre- and postdoctoral students. Competitive salaries, excellent start-up funds and newly renovated laboratory space will be provided.

Curriculum vitae, statement of research interests and names of three references should be sent by December 1, 2001, to: Dr. Richard C. Venema, Faculty Search Committee Chair, Vascular Biology Center, Medial College of Georgia, Augusta, GA 30912-2500. Tel: 706-721-2576; Fax: 706-721-9799; email: rvenema@mail.mcg.edu.

The Medical College of Georgia is an EOE/AAE. Applications from women and underrepresented minorities are particularly encouraged.

NEUROSCIENCE FACULTY POSITION THE UNIVERSITY OF MONTANA

Applications are invited for a Tenure-Track faculty position in the Dept. Pharmaceutical Sciences to strengthen research and graduate education in the neurosciences as part of an NIH funded Center for Biomedical Research Excellence (COBRE) in Structural and Functional Neuroscience. Research in the Center focuses on CNS protein structure/function as related to signal transduction, transport, and neurodegeneration. Specifically, we seek a candidate with research interests at the interface of Physiology, Biochemistry, Biophysics, and/or Pharmacology who utilizes electrophysiological approaches to investigate the structural and functional properties of ion channels, transmitter receptors, or transporters. Successful candidates will be expected to establish vigorous externally funded research programs that complement Departmental and Center strengths, supervise graduate students, and teach at the graduate and undergraduate levels. Applicants must have a doctoral degree, postdoctoral research experience, and demonstrated ability or potential to secure NIH funding. Except in unusual cases, the appointment will be made at the Assistant or Associate Professor levels. A competitive start-up package is available.

Applications received by Dec. 3, 2001 will receive full consideration; review will continue until the position is filled. More detailed information may be obtained from the Center Director R. Bridges (bridgesr@selway.umt.edu) or from http://www.umt.edu/csfn. Send letter of application, including CV, statement of research plans, and three letters of reference, to:

Neuroscience Search R. Bridges Department Pharmaceutical Sciences, SB271 The University of Montana Missoula MT 59812-1552

Equal Opportunity/ Affirmative Action Employer

Faculty Position Department of Molecular and Structural Biochemistry North Carolina State University

The Department of Molecular and Structural Biochemistry at North Carolina State University invites applications for a tenuretrack faculty position at the Assistant Professor level. The Department is in the College of Agriculture and Life Sciences, is affiliated with the College of Physical and Mathematical Sciences, and has interactions with many scientists in the Research Triangle area. This search is for candidates who will focus on protein X-ray crystallography and who will complement the University-wide efforts in proteomics. In addition to a strong research program, responsibilities will include undergraduate and graduate teaching. A Ph.D. in Biochemistry or closely related field is required. Qualified applicants must provide curriculum vitae, a research statement, and a description of teaching interests. Three reference letters should be sent directly. Review of applications will begin on December 1, 2001 and will continue until a suitable candidate is found. The proposed hire date is July 1, 2002. Application materials should be mailed to:

Dr. Carla Mattos, Chair, Faculty Search Committee Department of Molecular and Structural Biochemistry Box 7622, 128 Polk Hall North Carolina State University Raleigh, NC 27695-7622 http://biochem.ncsu.edu

NC State University is an Equal Opportunity and Affirmative Action Employer. Individuals with disabilities desiring accommodations in the application process should contact Dr. Carla Mattos (919)513-2556, carla_mattos@ncsu.edu or Dr. Dennis Brown (919)515-5802, dennis_brown@ncsu.edu.

Discovery: the chance to make a difference

One of the world's leading pharmaceutical companies, active in 100 countries

10,000 people dedicated to R&D, with centres of research excellence in the UK, US and Sweden

Over £5 million invested each working day to ensure a flow of new medicines that make a difference

Team Leader

within the department of General Pharmacology & Animal Care, AstraZeneca R&D, Södertälje, Sweden.

You will be responsible for the team and the method and competence development for the assessment of effects on the cardiovascular system in dogs. This will include the development of screening methods for discovery projects and safety pharmacology documentation for projects in development phase. Candidates will have a Ph. D. or equivalent experience in pharmaceutical, medical or veterinary sciences or related fields, with a good knowledge of cardiovascular physiology and experience in cardiovascular research in large animals.

For further information about the position, please contact Ann-Christin Ericson +46 8 553 263 91.

Please send your written application marked "Team Leader ref. nr 10-5339" to: AstraZeneca R&D Södertälje, Human Resources, Lili Hofbauer, 151 85 Södertälje, Sweden.

Closing date: 9 November 2001

For more information about our organisation visit our website at **whethere and the second sec**



Assistant/Associate Professor Department of Neurobiology Harvard Medical School

The Department of Neurobiology at Harvard Medical School invites applicants for the position of Assistant/Associate Professor. Preference will be given to candidates who study neural circuits with innovative approaches, including molecular biology, electrophysiology, optical imaging, or MRI. We have recently established a Brain Imaging Core with facilities for small-animal MRI, optical imaging, and single and multi-photon confocal microscopy. This tenure track position offers outstanding scholarly and scientific resources in a collegial and collaborative atmosphere that includes strong ties to related departments throughout Harvard, its affiliated hospitals and the Boston neuroscience community. The position also offers the opportunity to teach exceptional graduate, medical and health science technology students with strong interests in neuroscience and related technologies. Candidates must have a Ph.D., M.D. or equivalent graduate degree. Applicants should send a letter of application, including a curriculum vitae, a brief description of research interests, and the names and contact information of at least three references to:

Neurobiology Search Committee c/o Ms. Vickie Monta Department of Neurobiology Harvard Medical School 220 Longwood Avenue Boston, MA 02115

Applications must be received no later than January 5, 2002.

Harvard Medical School is an equal opportunity/affirmative action employer with an institutional commitment to diversity in its faculty. Department of Health and Human Services National Institutes of Health National Institute of Mental Health

The National Institutes of Health, National Institute of Mental Health, is seeking a talented scientist to advance and direct the extramural grant support of basic research in emotion, motivation, and mood. The position of Chief, Emotional Processes Program (GS-13/14, \$63,211 - \$99,391 (salary includes special pay for Medical Officers; salary range will change after the 2002 pay adjustment), is located in the Behavioral Science Research Branch, Division of Neuroscience and Basic Behavioral Science, NIMH. The position offers broad exposure to current issues related to the study of emotion and scientific engagement with the research community. Qualifications include a doctorate in a relevant behavioral science discipline as well as appropriate research experience. In addition to knowledge of emotional processes from behavioral and psychosocial perspectives, familiarity with psychobiological and neural approaches is an asset. The full range of Federal fringe benefits/vacation and sick leave is included. Interested candidates should contact: Ms. Malca Giblin, Personnel Management Branch, NIMH, 301-443-9094.

A copy of the full text vacancy announcement is available via the World Wide Web:

http://www.nimh.nih.gov/orm/pmb/nimhjobs.cfm. Please refer to announcement number **NIMH-01-00118**. Applications must be post-marked by the closing date of November 30, 2001 and received within five business days of the closing date.

Equal Opportunity Employer. U.S. Citizenship is required.



AMERICAN ASSOCIATION FOR THE ADVANCEMENT OF SCIENCE

AAAS Science + Technology Policy Fellowships, 2002:03

What >>> Help shape science and technology policy in Washington, DC: Contribute scientific and technical information and external perspectives to federal decision-making, while learning how government works. The AAAS fellowship programs provide a unique participatory public policy experience for scientists and engineers, through one-year assignments involving domestic and international science policy issues in the Congress and several executive branch agencies. Stipends begin at \$55,000.

Uho >>> Applicants must have a Ph.D. or an equivalent doctoral-level degree by the application deadline from any physical, biological or social science, any field of engineering or any relevant interdisciplinary field. Individuals with a master's degree in engineering and at least three years of post-degree professional experience also may apply. U.S. citizenship is required. Federal employees are ineligible. Approximately 50 fellowships are awarded in 10 different programs. Underrepresented minorities and persons with disabilities are encouraged to apply.

Uhen >>> The fellowship year begins September 1, 2002. Fellows attend a two-week orientation before beginning their assignments and participate in a year-long seminar series on topics relevant to science, technology and public policy. Application deadline is January 10, 2002.

Uhere >>> Fellows are placed in the Congress, the National Science Foundation, the National Institutes of Health, the Department of State, the Department of Defense, the Agency for International Development, the Environmental Protection Agency, the Department of Agriculture, the Food and Drug Administration, the Department of Justice, the Department of Energy and other federal offices.

Why >>> AAAS sponsors these programs to provide the opportunity for accomplished and societallyaware scientists and engineers to participate in and contribute to the public policy making process of the federal government. The programs include:

- + Congressional Fellows
 - + Diplomacy Fellows
- + AAAS/NIH Science Policy Fellows
- + Defense Policy Fellows
- + AAAS/NSF Science and **Engineering Fellows**
- + Science, Justice, and
- **Public Policy Fellows**
- + Environmental Fellows
- + AAAS/NTI Fellows in **Global Security**
- + Risk Policy Fellows
- + Roger Revelle Fellows
- in Global Stewardship

How >>> For application instructions and further information: www.fellowships.aaas.org. AAAS Science and Technology Policy Fellowship Programs, 1200 New York Avenue, NW, Washington, DC 20005 • Phone 202/326-6700 • E-mail science policy@aaas.org



www.fellowships.aaas.org

Discovery: the chance to make a difference

One of the world's leading pharmaceutical companies, active in 100 countries

10,000 people dedicated to R&D. with centres of research excellence in the UK, US and Sweden

Over £5 million invested each working day to ensure a flow of new medicines that make a difference

Post Doc position

within the department of General Pharmacology & Animal Care, AstraZeneca R&D Södertälje. It has been shown that both cardiac and non-cardiac drugs may induce QT-prolongation, known as the Long QT-syndrome. This may lead to life threatening arrhythmias. The Post Doc program aim to improve our conscious dog models for assessment of cardiovascular effects of non-cardiac drugs.

You will be responsible for a project aiming to find a robust method of measuring the QT-interval in the paced conscious beagle dog in relation to changes in heart rate and to compare the specificity and sensitivity of the conscious telemetred dog under paced and un-paced conditions with the paced anaesthetised dog model. The work will be in close collaboration with the specialists in cardiovascular research of class III antiarrhythmic agents at AstraZeneca R&D in Mölndal.

Candidates will have a Ph.D. in pharmaceutical, medical or veterinary sciences or related fields. Experience in experimental animal research is required. Besides a good knowledge of cardiovascular physiology, experience of cardiovascular research in dogs is an advantage. Good oral and written communication skills are required.

For further information about the position, please contact Ann-Christin Ericson +46 8 553 263 91.

Please send your written application marked "Post Doc GSP ref. nr 10-5330" to: AstraZeneca R&D Södertälje, Human Resources, Lili Hofbauer, 151 85 Södertälje, Sweden.

Closing date: 9 November 2001

For more information about our organisation visit our website at www.eduate.ee





LIFE SCIENCES - 3 POSITIONS 1 Associate/Full Professor and 2 Assistant Professors Gamete or Stem Cell Biology and Immunology

The Department of Veterinary and Animal Sciences at the University of Massachusetts will fill 2 positions in Developmental Biology (cloning, gamete and/or stem cell biology) and 1 in Immunology and Infectious Diseases beginning Sept. 2002. to complement our strong programs in Reproductive and Development Biology and Immunity and Infectious Diseases. Candidates with a Ph.D. or Ph.D./D.V.M., post-doctoral experience, training in molecular and cellular biology and strong evidence of productivity are encouraged to apply. Positions will be filled at the rank of 1 Associate/Full Professor and 2 sistant Professors

1. Developmental Biologist with interest in gamete logy, cloning and early events of nuclear reprogramming; 2. Developmental Biologist with interest in gamete and stem cell biology;

3. Immunologist with interest in cellular responses to nathogens. lymphocyte signaling or lymphoid development.

Candidates will be expected to develop a vigorous, extramurally-supported, research program, participate in our graduate training and undergraduate teaching programs and in campus-wide interdisciplinary programs in Molecular and Cellular Biology or Neuroscience and Behavior

Applicants should send a letter of application, curriculum a, description of research interests and have three letter of recommendation sent to Professor Robert T. Duby Head, Department of Veterinary and Animal Sciences, 314 Paige Lab, University of Massachusetts Amherst, MA 01003. Review of applications will begin December 15, 2001 and continue until the positions an filled.

The University of Massachusetts is an Affirmative Action/Equal Opportunity Employer. Women and members of minority groups are encouruged to apply.

UNIVERSITY of IOUISVILLE University of Louisville School of Medicine **Endowed Chair in Hearing Research**

Health Sciences Center

The University of Louisville, as part of a collaboration among its School of Medicine, College of Arts & Sciences, and The Edith and Henry Heuser Hearing Institute, invite nominations and applications for an Endowed Chair in Hearing Research. The University is engaged in a vigorous effort to advance research. The areas of research in genetics/molecular medicine and neuroscience have been targeted for investment. The University of Louisville is a Carnegie Doctoral/Research Extensive institution with a total of \$60,000,000 in external grant support and an endowment of over \$500,000,000. The University has benefited from enlightened state educational support resulting in 70 endowed chairs and professorships. The Heuser Hearing Research Endowed Chair fits within the strategic vision of research central to the University's Challenge for Excellence.

The Heuser Hearing Research Endowed Chair is designated for research focusing on genetics as it relates to deafness/hearing loss, hearing loss in the aged, cochlear implants or on speech as it relates to hearing loss. Since the research program will be mainly housed at The Heuser Institute, the focus of research should be directed toward hearing in humans. The ideal candidate will be eligible for a joint appointment at the rank of Tenured Full Professor in both the School of Medicine and the College of Arts & Sciences.

Minimal requirements include an earned doctorate, M.D. or Ph.D. The Heuser Hearing Professor will be a nationally/internationally recognized scholar with a strong and ongoing research record as evidenced by significant, continuous federal grant funding. Moreover, the successful candidate will demonstrate a commitment to collaborate with colleagues across the University and otologic community.

The review process will begin immediately and will remain open until a suitable candidate is identified or the search is closed. Nominations should include a curriculum vitae. Applications and nominations are requested by December 15, 2001 and should include a letter of interest including a statement of research goals, curriculum vitae, the names, mail and e-mail addresses and telephone numbers of at least four references to: Dr. Laura Schweitzer, Chair, Heuser Hearing Endowed Chair Search Committee, University of Louisville School of Medicine, Abell Administration Center, 323 East Chestnut Street, Louisville, KY 40202-3866

POSITIONS OPEN

DIRECTOR/NINE FACULTY Center for Bioinformatics and Computational Biology University of Maryland, College Park

The University of Maryland invites FACULTY applications at all levels for the newly established Center for Bioinformatics and Computational Biology. The campus has committed substantial resources to the Center including funds for the recruitment of nine new faculty including a Director. It is anticipated that the primary specialization areas of the new faculty will collectively span the fields of computer science, mathematics and statistics, molecular biology, molecular evolution/phylogeny, and biochemistry. The primary responsibility of the new faculty will be to lead a nationally visible research program in selected areas of computational genomics, proteomics, and molecular evolution, complementing existing strengths at the University of Maryland. Candidates for the Director position are expected to be senior Researchers with prominent recognition in these areas. All the new faculty will be housed in contiguous space set aside for the Center and will have access to significant high-end computing infrastructure through the University of Maryland Institute for Advanced Computer Studies. Each will also be affiliated with at least one other campus academic unit appropriate to her/his interests. There is ample potential for collaboration with other outstanding bioinformatics research groups nearby in organizations such as NIH, Celera, TIGR, the Maryland Biotechnology Institute, and the Smithsonian Institution. To apply, send a letter of application, curriculum vitae, and URL for additional information to e-mail: cecilia@umiacs.umd.edu and have at least three letters of recommendation sent to:

Cecilia Kullman Center for Bioinformatics and Computational Biology Institute for Advanced Computer Studies 2131 A.V. Williams Building University of Maryland College Park, MD 20742 Website:

http://www.umiacs.umd.edu/centers/bio.htm Applications will be accepted until the positions are filled.

The University of Maryland is an Affirmative Action/Equal Opportunity Employer. Women and minorities are encouraged to apply.

ASSISTANT PROFESSOR, biology education. The Department of Biological Sciences, Southern Illinois University Edwardsville, invites applications for a tenure-track position at the Assistant Professor level. This position will be a joint appointment with the Office of Science and Mathematics Education. We seek candidates with training in biology education. Responsibilities of the successful candidate will include periodic teaching of our biology secondary methods course and science foundations courses, advising students and student teachers, and involvement in science outreach activities. Candidates must also exhibit potential for independent and innovative science/biology education research involving undergraduate and Master's students. Qualifications: a Ph.D. in biology or education (with strong emphasis in biology). Precollege teaching experience and secondary education certification are preferred as is a record of research in the area of biology education. To apply, send letter of application, statement of teaching interests and statement of research interest, curriculum vitae, copies of all transcripts, relevant publications, and three letters of reference to: Chair: Biology Education Search Committee, Box 1651S, Department of Biological Sciences, Southern Illinois University Edwardsville, Edwardsville, IL 62026. Review of applications will begin on January 2, 2002, and will continue until position is filled. SIUE is a comprehensive regional university located on a 2,660-acre campus in a semirural setting only 25 minutes from downtown St. Louis, Missouri, The University is dedicated to excellence in undergraduate education. SIUE is an Affirmative Action/Equal Opportunity Employer.

POSITIONS OPEN

BIOLOGY The American University in Cairo

Founded in 1919, AUC's campus is located in Cairo, Egypt, and its degree programs are accredited by the Commission on Higher Education of the Middle States Association of Colleges and Schools. For more information, see our website: http://www. aucegypt.edu. One-, two-, or three-year appointments subject to mutual agreement will begin September 2002. Renewal of an appointment depends upon institutional needs and/or the appointee's performance. The normal teaching load is three courses per semester and English is the language of instruction. Salary and rank are according to scale based on qualifications and professional experience. Ph.D. is required; teaching experience is preferred. For expatriates, housing, annual round-trip air travel for appointee and accompanying family, plus schooling for up to two children are included. In view of AUC's protocol agreement with the Egyptian government (which requires specific proportions of Egyptian, United States, and third-country citizen faculty), at this time preference will be given to qualified applicants who are U.S. citizens.

The Department of Biology has two vacancies:

Teach and conduct research in marine biology. Special attention will be given to candidates with expertise in the Red Sea. Should have the ability to teach general biology and two of the following areas: invertebrate zoology, animal behavior, systematics, and quantitative biology. Ability to teach scientific thinking is an asset. Position Number BIOL-1.

Teach and conduct research in the area of ecology and environmental biology. Special attention will be given to candidates with expertise related to desert or river ecosystems and experience using GIS. Candidates should have the ability to teach general biology and two of the following areas: invertebrate zoology, animal behavior, systematics, quantitative biology. Ability to teach scientific thinking is an asset. Position Number BIOL-2.

E-mail a letter of application specifying Position Number with curriculum vitae and names and addresses of three references to e-mail: facultyaffairs@ aucnyo.edu or mail to: Dr. Earl (Tim) Sullivan, Provost, The American University in Cairo, 420 Fifth Avenue, Floor 3–SCI, New York, NY 10018-2729. Applications accepted until position is filled.

The American University in Cairo is an Equal Opportunity Employer.

FACULTY POSITION Department of Materials Science and Engineering The Johns Hopkins University

The Johns Hopkins University invites applications for a tenured or tenure-track faculty position in the Department of Materials Science and Engineering. The successful candidate will be expected to develop an innovative research program and to teach at both the undergraduate and graduate level. Applicants should have a Ph.D. in materials science and engineering or related field and must have demonstrated ability to establish an internationally recognized research program. Although it is anticipated that the appointment will be at the tenured FULL PRO-FESSOR level, outstanding candidates at the AS-SISTANT or ASSOCIATE PROFESSOR level will also be considered.

Applicants should submit a detailed résumé; a statement of research plans and teaching interests; and the names, addresses (including e-mail), and telephone numbers of three references to: Chair, Search Committee, Department of Materials Science and Engineering, 102 Maryland Hall, The Johns Hopkins University, Baltimore, MD 21218. Information on the Department of Materials Science and Engineering can be found at website: http://www. jhu.edu/~matsci/.

To ensure full consideration, applications should be received by February 1, 2002.

Johns Hopkins University is an Equal Opportunity/Affirmative Action Employer. Women and minorities are strongly encouraged to apply.

POSITIONS OPEN

FACULTY VACANCIES BIOMATERIALS AND TISSUE ENGINEERING

The University of Connecticut Health Center The University of Connecticut Health Center is seeking to fill two tenure-track faculty positions in The Center for Biomaterials, one at the JUNIOR LEVEL and one at the ASSOCIATE/FULL PRO-FESSOR level. The Center for Biomaterial's primary research focus is material-tissue interfacial behavior, which includes tissue response at the cellular and molecular level, modification and characterization of both cell and material surfaces, nanofabrication and biomimetics, development of bioinspired biomaterials, and tissue and cellular engineering. Research in the Center comprises basic and applied biological and material science projects that are intended to elucidate mechanisms and result in new biomedical technologies. Applicants with expertise in polymer synthesis, structural biology, gene therapy, or the biology of cell receptors are encouraged to apply.

The Center for Biomaterials facilitates multidisciplinary opportunities to collaborate with existing strong research groups at the University of Connecticut. This search is one portion of a campuswide faculty hiring effort in biomaterials with additional searches ongoing in the Institute of Materials Science, the Department of Mechanical Engineering and Materials Science, and the Department of Chemical Engineering. For the Health Center positions, significant support is available for research and laboratory space and start-up. The new faculty members will also participate in the development and teaching of a new graduate program in biomaterials. All Center faculty are encouraged to interact with the significant biomaterials industry located in Connecticut and neighboring states.

A Ph.D. or equivalent in bioengineering, chemical engineering, or related field is required. The search will remain open until the vacancies are filled.

Applicants should send curriculum vitae, copies of recent significant publications and brief descriptions of current research, future plans, and funding experience to: Dr. James D. Bryers, The Center for Biomaterials, MC 1615, University of Connecticut Health Center, 263 Farmington Avenue, Farmington, CN 06030-1615. For any additional information, interested persons should contact Dr. Bryers; e-mail: jbryers@nso2.uchc.edu.

An Affirmative Action/Equal Opportunity Employer; Minorities/Females/Persons With Disabilities/Veterans.

FULL/ASSOCIATE/ ASSISTANT PROFESSOR Endocrinology

The Department of Animal Sciences at Rutgers, The State University of New Jersev, invites applications for an academic-year, tenure-track faculty position in the area of endocrinology. The Department is interested in recruiting individuals with expertise in transgenic technology and other innovative molecular techniques. The candidate will be expected to establish an extramurally funded research program in an area of endocrinology that will interface with current departmental interests. Teaching at the undergraduate and graduate level is expected. Candidates must have a Ph.D. or equivalent, a demonstrated publication record and, to be considered at the Full or Associate Professor level, a strong record of extramural funding. Opportunities exist to interact with faculty from various departments and research centers at Rutgers and the University of Medicine and Dentistry of New Jersey as well as the extensive pharmaceutical and biotechnology industry located in the area. Re view of applications will begin immediately. Applicants should submit a letter of application with a statement of research and teaching interests, curriculum vitae, and the names of three references to: Dr. Wendie Cohick, Search Committee Chair, Department of Animal Sciences, Rutgers, The State University of New Jersey, 84 Lipman Drive, New Brunswick, NJ 08901-8525. Rutgers, The State University of New Jersey, is an Equal Opportunity/Affirmative Action Employer.







Array BioPharma is a publicly held drug discovery company creating new drug candidates through the integration of chemistry, structural biology and informatics. We collaborate with leading pharmaceutical and biotechnology companies to identify novel small molecule drugs. We leverage our drug discovery platform to develop our own pipeline of prophetary drug candidates. To expand this discovery platform, Array is seeking to hire pragmatic, driven scientists to lead from the bench in our discovery biology group. The following positions are available:

DIRECTOR OF DISCOVERY BIOLOGY

We are seeking a Director of Discovery Biology with a Ph.D. and 10+ years relevant experience in small molecule drug discovery biology programs. Experience in proposing projects, validating targets, and participating in teams that are responsible for moving pre-clinical candidates to clinical development is required. Expertise in leading teams responsible for protein production and characterization, cell biology, assay development, high throughput screening, or animal pharmacology is essential. Strong interpersonal and leadership skills are required.

GROUP LEADER/SCIENTISTS-CELL BIOLOGISTS We are seeking highly motivated individuals with a Ph.D. and 5+ years (Group Leader)/2+ years (Scientists) of experience in cell biology to support small molecule drug discovery programs. Extensive experience in functional assay development and excellent skills in experimental interpretation is essential. Expertise in oncology and inflammation assays is preferred. Experience in designing systems to validate targets and identify new pathways are desired for the senior level position. The group leader position will have supervisory and laboratory responsibilities.

PROTEIN CHEMISTS

We are seeking highly motivated individuals with a Ph.D. and 4+ years of industrial experience purifying multi-milligram quantities of recombinantly expressed proteins for crystallography and high throughput screening. Extensive experience in refolding proteins and purifying non-tagged proteins is required. Experience in protein characterization and enzymology is desired.

ASSAY DEVELOPMENT SCIENTISTS

We are seeking a highly motivated individuals with Ph.D. and 2+ years of relevant experience in a pharmaceutical drug discovery environment. Extensive experience in developing numerous assays applicable to the areas of enzymology, *in vitro* drug metabolism and cellular drug profiling is required. Experience in the use of automated screening systems and biological database software packages is desired. Strong data interpretation and quantitative analysis skills are critical.

HTS/AUTOMATION SCIENTISTS

We are seeking a highly motivated individuals with 5+ years of relevant experience in a pharmaceutical drug discovery environment. Extensive experience in automating assays in 384 well format, use of automated screening systems and biological database software packages is required. Strong interpersonal skills and equipment trouble-shooting skills are required.

We offer an excellent compensation package including competitive salary, stock options, comprehensive benefits, and the opportunity to be a part of a growing team of experienced scientists who want to revolutionize drug discovery. Array is located in state-of-the-art facilities in Boulder and Longmont, Colorado, a gateway community to the Rocky Mountains, providing a high quality of life. Please go to www.arraybiopharma.com to learn more about our organization.

> For consideration, please apply to: Array BioPharma, Attn: Human Resources, 3200 Walnut Street, Boulder, CO 80301, hr@arraybiopharma.com or by FAX at 303-381-6638. Array is an equal opportunity employer

ASSISTANT OR ASSOCIATE PROFESSOR IN PLANT BIOLOGY

The Department of Plant and Microbial Biology, University of California, Berkeley is seeking applicants for an Assistant Professor (tenure track) or Associate Professor (tenured) for a nine-month position, starting July 1, 2002. The appointee is expected to develop a vigorous, independent research and teaching program in an area of plant biology that would complement the expertise of existing faculty in the department. Representative research areas of particular interest include: plant evolution and development, and molecular plant biochemistry. The appointee would be expected to teach undergraduate and graduate courses in plant biology with an emphasis in the areas of evolution, development or biochemistry. Candidates must have a Ph.D. degree and productive postdoctoral experience. For a more detailed description of this position consult URL http:// plantbio.berkeley.edu/jobs

Please send a curriculum vitae, reprints of 3-5 relevant publications, a 1-3 page statement of future research plans, a brief description of teaching interests and philosophy, and the names and ad dresses of at least three references to:

Chair, Plant Biology Search Committee Department of Plant and Microbial Biology 111 Koshland Hall University of California Berkeley, CA 94720-3102

Applications must be received by December 17, 2001. Applications submitted after the deadline will not be accepted.

The University of California is an Equal Opportunity/Affirmative Action Employer.

Staff Scientist Position Structural Biophysics Section Laboratory of Biophysical Chemistry, NHLBI

The Laboratory of Biophysical Chemistry (LBC) of the National Heart, Lung, and Blood Institute. National Institutes of Health is accepting applications from motivated, creative and bright individuals for the position of a Staff Scientist in the Structural Biophysics Section. The Structural Biophysics Section focuses its research in areas of the development of central nervous system, cell signaling, and apoptosis. The successful candidate will have previous research experience in the field of structural biology and high resolution NMR. This will include identifications of relevant proteins in the above areas and determination of their highresolution structures using state of the art methodology in NMR. In addition, the Staff Scientist will be required to provide research support for other investigators in the LBC.

The position is open immediately for a Ph.D. scientist with at least three years postdoctoral research experience. Applicant should have experience in design and implementation of pulse sequences on Bruker Avance high field solution NMR spectrometers, in multidimensional NMR data analysis and structure calculations, and in molecular biological techniques including cloning, construction of plasmids, protein purification and assay along with publications in peerreviewed journals.

The successful candidate will be offered a competitive salary commensurate with experience and qualifications under Title 42. Appointees must be US citizens, resident aliens, or nonresident aliens with a valid employment authorized visa.

Applicants should submit a curriculum vitae, and bibliography and arrange for three letters of reference to be sent to:

> Mrs. Christine Fisher, Human Resources Branch National Heart, Lung, and Blood Institute 31 Center Drive, MSC 2484. Building 31, Room 5A28 Bethesda, MD 20892-2484 FisherCM@nhlbi.nih.gov

Please include vacancy identifier, HL-01-0122, on ALL correspondence. Applications must be received no later than November 26, 2001.

NIH is an Equal Opportunity Employer. Applications from women, minorities, and persons with disabilities are strongly encouraged. The NHLBI/NIH is a smoke-free workplace.

POSITIONS OPEN



FACULTY POSITIONS IN CLINICAL GENETICS University of Wisconsin Medical School

The University of Wisconsin Medical School has three tenure-track positions available at the **ASSIST-ANT PROFESSOR** level in the Departments of Medical Genetics and Pediatrics as part of continued expansion. The candidate should possess an M.D. or M.D./Ph.D. with Board certification or Board eligibility in medical genetics.

The University of Wisconsin–Madison, located on Lake Mendota, ranks among the nation's top universities. It contains a growing, dynamic biomedical community with expanding programs in human genetics, genomics, bioinformatics, biotechnology, gene therapy, and stem cells. There is also access to on-campus diagnostic laboratories, gene and cellular therapy research groups, a GMP biomanufacturing/ gene therapy facility, and a biotechnology center. The majority of the successful candidate's time will be devoted to developing an independent research program in human genetics while the remainder will be spent providing clinical care in clinical or biochemical genetics.

Interested applicants should submit curriculum vitae, three letters of recommendation, and a two-page research plan to: Dr. Jon Wolff, Director of Clinical Genetics, University of Wisconsin–Madison, Waisman Center, 1500 Highland Avenue, Madison, WI 53705-2280. E-mail: gallagher@waisman. wisc.edu.

UW–Madison is an Equal Opportunity/Affirmative Action Employer.

FACULTY POSITION

The Department of Biology at Northeastern Illinois University invites applications for a tenuretrack ASSISTANT PROFESSOR position in botany beginning fall 2002. An earned Doctorate in a relevant discipline specializing in botany is required. Teaching graduate and undergraduate courses in plant morphology, anatomy, taxonomy, systematics, and in area of specialization. Participation in general biology courses for majors and nonmajors. Commitment to involve undergraduate and graduate students in research. Research and service are encouraged and expected. Review of applications begins October 29, 2001, and continues until position is filled. Send letter of application, curriculum vitae, e-mail address, statements of research and teaching interests, and three letters of recommendation with at least one concerning teaching effectiveness to: Dr. Simon L. Chung, Department of Biology, Northeastern Illinois University, 5500 North St. Louis Avenue, Chicago, IL 60625.

Affirmative Action/Equal Opportunity Employer.

Tampa Bay Research Institute (TBRI) is an independent, not-for-profit research organization situated on a lakeside setting in the scenic Tampa Bay, Florida, area. The Institute is housed in a modern facility with excellent laboratories suitable for research on the molecular biology, virology, and immunology of human chronic debilitating diseases.

TBRI seeks to recruit a researcher at the **ASSIST-ANT** or **ASSOCIATE MEMBER** level (equivalent to an **ASSISTANT** or **ASSOCIATE PROFES**-**SOR**) to study the molecular aspects of cytomegalovirus (CMV) pathogenesis as part of our expansion plans. Applicants who are currently engaged in a peerreviewed funded program are encouraged to apply. This position comes with ample setup funds and an attractive compensation plan.

Please send current curriculum vitae and statement of research plans to: Chairman, Search Committee, Tampa Bay Research Institute, 10900 Roosevelt Boulevard North, St. Petersburg, FL 33716-2308. E-mail: tbriat@aol.com. TBRI is an Equal Employment Opportunity Employer.

POSITIONS OPEN

INVESTIGATOR Antiinfectives

GlaxoSmithKline, an international producer of pharmaceuticals and consumer health care products, is seeking an individual to serve as Investigator. Antiinfectives, at its research and development facility in Collegeville, Pennsylvania. Principal duties are to design, implement, and direct microbial enzymology research aimed at identifying, isolating, and characterizing novel enzymes in bacterial biosynthetic pathways and enzymes involved in drug resistance mechanisms.

Position requirements are a Ph.D. degree in biochemistry or biophysics and three years of experience in the job offered or three years of experience in biochemical/enzymological research including experience in (1) expressing proteins using inducible promoter vectors and protein purification techniques; (2) analyzing kinetic, catalytic, and inhibition mechanisms of enzymes using steady-state, rapid freeze quench, fluorescence, and absorbance stopped-flow techniques; (3) determining pH profiles of steadystate kinetic parameters, solvent and primary kinetic isotope effects, and IC50 values of inhibitors; (4) synthesizing labeled substrates and developing enzymatic assays employing absorbance, fluorescence, and radiochemical thin-layer chromatography assay formats; (5) characterizing proteins, protein-ligand, and protein-protein interactions using biochemical, biophysical, and molecular biological techniques including UV, visible, infrared and fluorescence spectroscopy, circular dichroism, denaturing and nondenaturing gel electrophoresis, Western blotting, PCR, DNA ligation, E. coli transformation, agarose gel electrophoresis, DNA sequencing; (6) evaluating enzyme structure-function relations in conjunction with enzyme kinetics, ligand-binding studies, and site-directed mutagenesis techniques; (7) carrying out molecular modeling of enzyme structures and docking studies with small-molecule ligands using software such as Hypercam, Insight II, and Quanta/CHARMm.

GlacoSmithKline is dedicated to an innovative workplace and supports you with career-long opportunities and learning. We offer a competitive benefits and compensation package. For confidential consideration, please mail your résumé to: GlaxoSmith-Kline Pharmaceuticals, Job Code: RR-IAI, P.O. Box 40047, Philadelphia, PA 19106. Indicating Job Code is essential. Principals only; no agencies, please. For a full listing of current opportunities or to submit a résumé online, visit our website: http:// www.gsk.com.

Developing talent through Equality of Opportunity; Minorities/Females/Disabled/Veterans.

The Biology Department at Westminster College invites applications for an ASSISTANT PROFES-SOR tenure-track position starting in fall 2002. Teaching responsibilities include recombinant DNA molecular genetics, and foundations of biology. Each course includes three hours per week of lecture and a three-hour laboratory. Candidates must have Ph.D., possess expertise in a wide array of molecular (nucleic acid and protein) techniques, having a working knowledge of bioinformatics, and be committed to excellent teaching in a liberal arts environment. Westminster College is a coeducational, liberal arts institution with historical ties to the Presbyterian Church. The College enrolls about 1,500 full-time students and employs about 105 full-time faculty. It is located in a beautiful rural setting in close proximity to both Pittsburgh, Pennsylvania, and Cleveland, Ohio. The Biology Department is housed in a modern science building with excellent teaching, research, and computing facilities. To apply, send a letter indicating teaching experience, unofficial academic transcripts, and curriculum vitae. Arrange to have three letters of recommendation sent separately. Also include a statement of teaching philosophy addressing ability to teach lecture and laboratories in the courses listed above. All information should be received by November 23, 2001. Send materials to: Dr. Ann E. Throckmorton, Department of Biology, Westminster College, New Wilmington, PA 16172. Equal Opportunity Employer.

POSITIONS OPEN

THE UNIVERSITY OF ARIZONA TUCSON ARIZONA FACULTY POSITION Toxicology/Toxicogenomics

The Department of Pharmacology and Toxicology, College of Pharmacy, University of Arizona, invites applications for a tenure-track position at the **ASSIST-ANT** or **ASSOCIATE PROFESSOR** level for the academic year beginning fall 2002. Applicants must have a Ph.D., Pharm.D., or M.D.

and postdoctoral experience in cellular and molecular toxicology. Preference will be given to research interests integrating toxicology, functional genomics or proteomics, and bioinformatics. The successful applicant will be expected to develop and maintain an extramurally funded research program and to contribute to the teaching mission of the College. A competitive start-up package will be provided; however, applicants for the Associate Professor level must have strong extramural support. We have a cooperative research environment with a can-do attitude and many opportunities for collaborations, participation in graduate programs, and NIH-funded Centers of Excellence including the NIEHS-funded Southwest Environmental Health Sciences Center. Excellent core facilities for DNA microarray, DNA sequencing, proteomics, and related technologies are also avail able. Tucson offers an excellent quality of life, affordable housing, and good schools. Review of applications will begin November 30, 2001, and will continue until the position is filled. We offer excellent benefits and competitive salaries.

An application letter, curriculum vitae, statement of research interests, and names and addresses of three to five references should be sent to:

AHSC Human Resources Job Number 993379 1501 North Campbell Avenue, Number 2233 P.O. Box 245010 Tucson, AZ 85724-5010

The University of Arizona is an Equal Employment Opportunity/Affirmative Action Employer; Minorities/Women/ Disabled/Veterans,

TENURE-TRACK POSITIONS Department of Biological Sciences

Southern Methodist University, Dedman College, Dallas, Texas. The Department of Biological Sciences is moving into the new, state-of-the-art sciences building in Dedman College in 2002. During the next three years, five new Scientists will be hired whose research complements an already strong molecular biology program. Two of the five positions are available beginning fall 2002. We hope to make at least two of the five appointments at the senior (AS-SOCIATE or FULL PROFESSOR) level. Whether junior or senior, all successful candidates must have a solid commitment to teaching and a strong record of research accomplishments in areas that utilize molecular/biochemical/cellular approaches. Additionally, candidates will be expected to develop vigorous, externally funded research programs in their chosen fields. Competitive start-up funds and salaries will be offered. Candidates should forward curriculum vitae, a brief statement of research plans, and three letters of recommendation to: Dr. Larry Ruben, Chair, Department of Biological Sciences, Southern Meth-odist University, Dallas, TX 75275. The two positions recruited this year begin fall semester 2002. The committee will begin its review of the applications on or about December 1, 2001. To ensure full consideration for the positions, the applications must be post-marked on or before December 1, 2001, but the committee will continue to accept applications until the positions are filled. The committee will notify applicants of its employment decisions after positions are filled. SMU will not discriminate on the basis of race, color. religion, national origin, sex, age, disability, or veteran status. SMU also is committed to nondiscrimination on the basis of sexual orientation.



Biology Assistant Professor

Tenure Track

Drew University, a liberal arts college in suburban New Jersey, seeks an Assistant Professor in Biology, Tenure-Track. Teach introductory evolution/genetics and a flexible set of advanced courses in such areas as evolution, conservation, animal behavior, and ecology. Supervise undergraduate research. Ph.D. and teaching experience required. Submit resume, statements of teaching and research interests, evidence of teaching excellence, ideas for research with undergraduates, and three letters of reference by November 11, 2001 to Carol Alfone, Biology Department, Drew University, Madison NJ 07940.

www.depts.edu/biol/home.htm

email inquiries to Dr. Sara Webb (swebb@drew.edu). AAVEOE

COLUMBIA UNIVERSITY The College of Physicians and Surgeons

The Department of Biochemistry and Molecular

Biophysics seeks to hire a biochemist as a new tenure-track faculty member. We are interested in persons who are studying the function of macromolecules, their interactions, or their molecular mechanisms of action. Such research could focus on biochemical questions addressing functions of proteins, nucleic acids, and other interesting macromolecules. Applications should include a CV and a brief statement of research goals. Three or more letters of reference should be sent independently.

Our department integrates biological structure with function through highly interactive collaborations between individual faculty members. We encourage applicants who have a special desire to be in such an interactive environment that integrates biophysical and biological disciplines. We are prepared to provide the necessary financial support to initiate strong research programs. The department Web site can be visited at: http://biochemistry.hs.columbia.edu

Material should be mailed to: Search Committee, Biochemistry and Molecular Biophysics, Box 36, 630 West I68th Street, New York, NY 10032. We take affirmative action toward equal employment opportunity. As manufacturers of the highest quality pharmaceutical, diagnostic, nutritional and hospital products, Abbott Laboratories is committed to improving lives. Share our vision for a healthier world and put more of what matters in life into your career, including a competitive salary, solid benefits and challenges that live up to your professional and personal goals.

's a matte

Neuroscience is one of the key drug discovery areas for Abbott. As we expand our activities in this area, we have a number of opportunities available in our analgesia program located in Abbott Park, IL.

Senior Research Molecular Neuropharmacologist

This key individual will lead efforts in the pharmacological characterization of novel compounds that act at ligand-gated ion channels, G-protein coupled receptors and signal transduction cascades. As an active contributor to independent research, a primary responsibility will be to define the role of these targets in nociceptive neurotransmission. Requirements include a Ph.D. with a strong background in biochemical/molecular pharmacology as evidenced by graduate and post-graduate training and published research. In addition to 4-7 years post-graduate experience with a proven track-record of accomplishment in either an industrial or academic setting, the successful candidate will be expected to provide expertise in the quantitative assessment of ligand/receptor interactions using both ligand binding and/or functional receptor assays using native tissues and clonal cell lines. Specific experience in the analysis of pharmacological data including quantitative kinetic and Schild analysis is essential, as are strong supervisory skills. Experience in the functional assessment of neurotransmission *in vitro* is also desirable. (Job Code 614HS)

Senior Research In Vitro Electrophysiologyist

Supervising other scientists working in the areas of *in vitro* and *in vivo* electrophysiology, this individual will provide both electrophysiological and optical imaging expertise to elucidating neurophysiological mechanisms of drug action. Requirements include extensive experience in state-of-the-art patch and voltage clamping techniques and extracellular recording methodology for the characterization of drug action at native and recombinant ligand-gated ion channels and G-protein coupled receptors. The successful candidate should have a Ph.D., a proven track record of independent research as evidenced by published research, 2-5 years drug discovery experience and knowledge of nociceptive neurotransmission mechanisms. (Job Code: 5777HS)

Proteomics is playing an increasingly significant role in pharmaceutical target discovery, target validation and compound profiling. As Abbott significantly increases its research commitment in this area, we are looking for a talented, experienced scientist to lead this effort.

Group Leader Proteomics

As a senior level Biochemist/Biologist, the successful candidate will be responsible for leading an advanced proteomics team and working closely with mass spectrometry and biology project leaders. This team will develop and apply the tools of proteomics to improve the drug discovery and development process. Responsibilities will include method development aimed at the enrichment, high sensitivity recovery and identification of protein targets. Requirements include a Ph.D. in life sciences (biochemistry, biology, cell biology) and at least 5 years of industrial research and management experience. Mass spectrometry-based protein identification, protein cross-linking and bioinformatics experience are a strong plus. Candidates with biochemical knowledge, expertise in bioseparations and handling/characterizing low abundance/endogenous levels of proteins are preferred. (Job Code: 6329HS)

Follow your aspirations to Abbott for diverse opportunities, competitive salaries, great benefits, a 401k retirement savings plan, a company paid pension plan and profit sharing, as well as growth and stability to build your future. For immediate consideration, please visit our website at www.abbott.com. Click on 'Career Center,' then 'Job Opportunities,' and insert appropriate job code listed above in the 'Keyword' field at the bottom of the page.

www.abbott.com Quality Health Care Worldwide

n EOE, we are committed to emp

ABBOTT

LABORATORIES

POSITIONS OPEN

CHAIR, DEPARTMENT OF CHEMISTRY. Towson University seeks a dynamic Chair with a Ph.D. in a chemical science to provide dedicated leadership at a senior rank for its Department of Chemistry. The successful candidate will have an exemplary record in undergraduate teaching, research with undergraduates, external funding, and academic administration plus excellent interpersonal and leadership skills. This ACS-accredited department of 15 full-time faculty, five staff, and six full-time equivalent parttime faculty offers a B.A./B.S. in chemistry, a B.A./ B.S. in medicinal chemistry (jointly with UMD School of Pharmacy), a post-Baccalaureate certificate in chemistry for H.S. teachers, and is an integral part of both the Molecular Biology/Biochemistry/Bioin-formatics and Environmental Science and Studies interdisciplinary programs. Classes are small so that Towson combines a liberal arts atmosphere with the diversity and opportunities of a large institution with expanding research and graduate programs. Towson University is a public, comprehensive university and a member of the University System of Maryland, enrolling 16,000 students on its attractive campus in suburban Baltimore. More information may be found on the University's website: http://www.towson.edu. Please send a letter of application that includes your perception of the role of a department chair, a statement of scholarly interests, a résumé, and names and addresses of three references to: Chemistry Chair Search Committee, Office of the Dean, College of Science and Mathematics, Towson University, 8000 York Road, Towson, MD 21252. Review of applications will begin on December 17, 2001, and continue until the position is filled. Towson University is an Equal Opportunity/Affirmative Action Employer and has a strong institutional commitment to diversity. Women, minorities, persons with disabilities, and veterans are encouraged to apply

Case Western Reserve University (CWRU), Cleveland, Ohio, Division of Nephrology. The Division of Nephrology at CWRU has opportunities for RE-SEARCH SCIENTISTS to be based in the Renal Section at the Cleveland-Louis B. Stokes VA Medical Center. We are seeking an M.D. or M.D./Ph.D. Nephrologist who is Board certified in internal medicine and nephrology or Board eligible in nephrology. The applicant should be capable of developing an independent research program. This is a tenure-track position. This faculty member will have the opportunity for joint appointments in basic science departments. Academic rank commensurate with experience. We are also seeking a Ph.D. (or M.S./B.S.) Reseacher with experience in cell and molecular biol ogy. Academic rank and/or job title commensurate with experience. Forward curriculum vitae to: R. Tyler Miller, M.D., Professor of Medicine, Chief, Renal Section, Louis B. Stokes VA Medical Cen 10701 East Boulevard, Cleveland, OH ter. 44106. E-mail: rtm4@po.cwru.edu

Case Western Reserve University is an Affirmative Action/ Eaual Opportunity Employer.

ASSISTANT PROFESSOR MOLECULAR MICROBIOLOGY

A tenure-track Assistant Professor position is now available in the general area of molecular microbiology. Applicants must have several years of postdoctoral experience and excellent communication skills. The person hired will be expected to develop a vigorous, extramurally funded research program and to participate in undergraduate and graduate teaching including prokaryotic molecular biology. Salary, space, start-up funds, and facilities are competitive and the program is well equipped with modern instrumentation. Review of applications will begin on November 12, 2001, and continue until the position is filled. Applicants should forward complete curriculum vitae and research prospectus and arrange to have three letters of recommendation sent to: Dr. Gerald M. Carlson, Head, Division of Molecular Biology and Biochemistry, School of Biological Sciences, University of Missouri-Kansas City, 5007 Rockhill Road, Kansas City, MO 64110-2499. An Affirmative Action/Equal Opportunity Employer.

POSITIONS OPEN



SUPERVISORY RESEARCH LEADER Research Chemist/Research Engineer/Plant Physiologist/Research Food Technologist/ Research Biologist(Interdisciplinary)

The U.S. Department of Agriculture, Agricultural Research Service, Processed Foods Research Unit, Western Regional Research Center, Albany, California (located in the San Francisco Bay area), invites applications for the position of Research Leader, GS-14/15 (\$79,271 to \$121,218 per annum; salary commensurate with experience). The Research Leader will lead a dynamic 12-Scientist team to address marketability and healthfulness of agricultural commodities and processed food products. Cereal grains, legumes, fruits, and vegetables are the focus of research, which includes both basic and applied aspects. The Research Leader also conducts a personal research program. A Ph.D. or equivalent in physical sciences, life sciences, engineering, botany, plant physiology, food technology, microbiology, chemistry, physics or a related discipline or field of biological or physical sciences or engineering and at least one year of specialized experience in food science or technology is required. This is a competitive, permanent appointment and U.S. citizenship is required. A complete copy of the vacancy announcement and where to apply can be found at website: http://www.afm.ars. usda.gov/divisions/hrd/index.html. Select An-nouncement ARS-X1W-1546 or contact: Personnel; Telephone: 510-559-6090. Closing date for applications is December 3, 2001. For more detailed information on the position responsibilities, please contact: Dr. James Seiber; Telephone: 510-559-5600. The USDA is an Equal Opportunity Provider and Employer

ASSISTANT PROFESSOR, APPLIED ECOL-OGIST. The Department of Biological Sciences and the Environmental Sciences Program, Southern Illinois University Edwardsville, invites applications for a tenure-track position in applied ecology at the Assistant Professor level. We seek applicants with a background in terrestrial applied ecology and plant gas exchange and experience and commitment to research in climate change and/or pollution. The successful candidate will develop a course in agricultural ecology; teach other courses as requirements or electives in the program (e.g., applied ecology and pollution science); and develop a strong research program in climate change and/or pollution as it relates to plant gas exchange. Candidates must exhibit potential for independent and innovative research involving Master's and undergraduate students. Qualifications: A Ph.D. in biology or related field with specialization in applied ecology. Experience or education in plant gas exchange and ecosystem analysis and/or remediation is desirable. Postdoctoral teaching and research experience preferred. To apply, send a letter of application with a statement of your teaching philosophy and research interests; curriculum vitae; representative publications; copies of official university transcripts; three letters of reference submitted by references directly to the Department; and names, telephone numbers, addresses, and e-mail addresses (if available) of three references to: Chair, Applied Ecologist Search Committee, Southern Illinois University Edwardsville, Department of Biological Sciences, Box 1651, Edwardsville, IL 62026. Additional information about the Department and the Environmental Science Program can be seen at websites: http://www.siue.edu/BIOLOGY and http://www.siue.edu/ENVS. Review of applica-tions will begin on January 2, 2002, and continue until position is filled. SIUE is a comprehensive, regional university located on a 2,660-acre campus in a semirural setting only 25 minutes from downtown St. Louis Missouri. The University is dedicated to excellence in undergraduate education. SIUE is an Affirmative Action/Equal Opportunity Employer.

POSITIONS OPEN

ASSISTANT PROFESSOR of functional genomics, College of Agricultural Sciences, Penn state: Tenure-track position is available in the area of functional genomics to enhance our expertise in molecular genetics. This position has a 75% research and 25% teaching responsibility. Research responsibilities involve the integration of functional genomics into the study of domestic animal biology. Application of genomics research with emphasis upon animal reproduction, growth, or other production animal functions is desired. Experience in the investigation of gene regulation using state-of-the-art technology is a requisite. Demonstrated competence in expression profiling, genome analysis, and gene transcription is desirable. The successful applicant is expected to develop an internationally recognized, extramurally funded research program that focuses on basic science issues of relevance to the biology of animals. Exciting opportunities exist for interacting with colleagues in the Department and the Life Sciences Consortium whose research is in the fields of genetics, genomics, vertebrate development, transgenic biology, reproduction, lactation, or growth. The newly formed Genome Study Center also provides additional op portunities for interactions. The Teaching component will involve undergraduate and graduate teaching in the areas of genomics, animal biotechnology, or the candidate's expertise. Applicants must have a Ph.D. in animal science, biochemistry, genetics, or related discipline and a minimum of two years of postdoctoral training. A demonstrated ability to procure external funding is desirable. Salary is competitive and commensurate with background and experience. An attractive benefits package is available. A letter of application; résumé; a statement of research; teaching interest; and three professional reference letters should be submitted before January 2, 2002, to: C. S. Shashikant, Chair, Search Committee, Position Number S-12070, Department of Dairy and Animal Science, 324 Henning Building, The Pennsylvania State University, University Park, PA 16802. E-mail: css13@psu. edu. For more information about the Department, see website: http://www.das.psu.edu. Affirmative Action/Equal Opportunity Employer.

ASSISTANT PROFESSOR Quantitative Biology

The Departments of Biological Sciences, Mathematics, and Physics and Astronomy jointly invite applications for an Assistant Professor position in quantitative biology. Applicants must have a Ph.D. in an appropriate discipline and a strong research record. Preference will be given to applicants with interests in the analysis of spatially extended complex systems and appropriate postdoctoral training. Prior experience in an interdisciplinary environment and evidence of effective interdisciplinary communication skills are essential. The successful candidate will be appointed in one of the three aforementioned departments depending on his or her academic background and will participate in the Quantitative Biology Institute at Ohio University. He or she will also be expected to contribute to the ongoing development of interdisciplinary education and graduate training in the appropriate department. Competitive salary and research start-up funds are provided along with excellent benefits. Additional information about the Quantitative Biology Institute and the participating departments can be obtained through the University's website: http://www.ohiou.edu

Applicants should provide curriculum vitae including a statement of research and arrange to have three letters of reference sent to:

Dr. Michael H. Rowe, Chair Quantitative Biology Search Committee Department of Biological Sciences Ohio University Athens, OH 45701

Review of applications will begin December 15, 2001.

Ohio University is an Affirmative Action/Equal Opportunity Employer. Women and minorities are especially encouraged to apply.



FACULTY POSITION

BIOCHEMISTRY/STRUCTURAL BIOLOGY VANDERBILT UNIVERSITY SCHOOL OF MEDICINE

Applications are invited for a position in the area of macromolecular crystallography at the rank of Assistant, Associate or Full Professor. The Department of Biochemistry at the Vanderbilt University School of Medicine is a multi-disciplinary department, including faculty with interests in Cancer Biology, Enzymology, Structural Biology, Molecular Toxicology, Cellular and Molecular Neurosciences, Diabetes and Signal Transduction. Preference will be given to individuals using macromolecular crystallographic approaches to solve important and novel biochemical problems. The position is linked to a major new investment in structural biology at Vanderbilt.

Information about the Department, current faculty research interests, Vanderbilt University and Nashville can be found at http://medschool.mc.vanderbilt.edu/biochemistry.

Interested applicants must have completed a Ph.D. and or M.D. degree as well as postdoctoral training. Applications must be received by December 31, 2001. Submit a curriculum vitae, statement of research interests, and three letters of recommendation either electronically to: marlene.jayne@mcmail.vanderbilt.edu or by mail to the following address:

Search Committee Biochemistry/Structural Biology Department of Biochemistry 607 Light Hall, Vanderbilt University Nashville, TN 37232-0146

INNOVATE!

Ambion, Inc., is looking for talented individuals with strong skills in RNA-related technologies. Candidates should have a Ph.D. and postdoctoral experience, a strong publication record and an innovative and entrepreneurial spirit. Ambion offers a stimulating scientific environment where scientists have the independence to exercise their creativity.

CURRENT OPENINGS:

In situ Hybridization Job #312 : Requires experience in in-situ hybridization or histology.

RNA Methodology-Job #313 : Requires experience in RNA technologies.

RNA Isolation Job #314 : Requires an interest in working at the interface of molecular biology and chemistry to develop new technologies for RNA isolation.

Molecular Diagnostics Job #315 : Requires experience in developing new assays or nucleic acid isolation.

Pathology-Histology Job #316 : Requires a strong background in the area of histology/pathology or other areas of molecular diagnostics.

Lab/Assay Automation Job #323 : Requires experience with adapting assays and molecular biology procedures to multiple robotic platforms.

Mammalian Cell Culture Job #324 : Requires experience with generating and maintaining large numbers of cell lines and a cell culture facility. M.S. or Ph.D.

Ambion is located in Austin Texas. We offer competitive salaries, benefits, bonus plan and an employee stock option plan. For more information about these and other opportunities or to submit your resume visit:

www.ambion.com/jobs

EOE/AA

Ambion, Inc. 2130 Woodward St. Austin, TX 78744-1832 fax: (512)651-0201 www.ambion.com/jobs



Assistant Professor Physiology LOYOLA COLLEGE IN MARYLAND

The Biology Department at Loyola College is seeking an Assistant Professor in Physiology for a full-time, tenure-track position starting July 1, 2002. Loyola College is a liberal arts institution with a history of excellent teaching and a strong commitment to fostering the academic and personal development of students. Teaching responsibilities are 9 credits per semester. The successful candidate will teach an introductory-level lecture course on organismal biology, an introductory laboratory course on the process of science, and upper-level courses in comparative physiology, general physiology and their specialty area. Individuals who have a background in either invertebrate or vertebrate physiology will be considered. The appointee is expected to develop an active research program that results in publications, and should be willing to involve undergraduates. A Ph.D. in Physiology or related discipline and undergraduate students in research. Loyola College is a selective Jesuit Catholic institution that welcomes applicants from all backgrounds who can contribute to our unique educational mission. Loyola College is an Equal Opportunity Employer that seeks applications from women and members of minority groups. To apply, send curriculum vitae, the names of three references, a brief description of an upper level course that you would be interested in teaching, and statements of research interests and your teaching philosophy to:

Chair, Physiology Search Committee Biology Department Loyola College 4501 N. Charles St. Baltimore, MD 21210



Applications must be received by December 14, 2001 for consideration.

Loyola College is an equal opportunity employer welcoming applicants from all backgrounds who can contribute to our unique educational mission.



We seek a Physiologist who uses modern approaches (including but not limited to state-of-the-art biophysical, genomic, imaging, and modeling techniques) to explore physiological function at multiple levels of organization in animals. The area of specialty is open. The Biology Department is broad-based, covering molecular and organismal function as well as ecology of animals, plants, and microbes. The Penn academic community has strength in the following potentially relevant areas: muscle biology, neurosciences, and genomics. The candidate will be expected to contribute to teaching animal physiology to undergraduates as well as in the area of their own specialty. We expect to make the appointment at the tenure-track ASSISTANT PROFESSOR level; however, exceptional candidates could be considered at a higher rank. Please send curriculum vitae and summaries of past accomplishments and future plans in research and teaching. Candidates at the Assistant Professor level should arrange to have three letters of reference sent. Consideration of applications will start on December 15, 2001. Please address correspondence to: Physiology Search, Biology Department, Leidy Laboratories, University of Pennsylvania, Philadelphia, PA 19104. FAX: 215-898-8780. The University of Pennsylvania is an Equal Opportunity/ Affirmative Action Employer. Women and minorities are encouraged to apply.

PROTEIN CRYSTALLOGRAPHER Institute of Materials Science and Cell Biology University of Connecticut

Applications are invited for a tenure-track, full-time faculty appointment at the ASSISTANT or ASSO-CIATE PROFESSOR level. Applicants must have a Doctoral degree in a biochemical or biophysical field and postdoctoral experience. The research area of interest is X-ray crystallography of proteins or protein/ nucleic acids complexes, which will complement current research strengths in structural biology. The successful candidate will teach undergraduate and graduate courses in the Department of Molecular and Cell Biology and will be affiliated with the Polymer Program of the Institute. The successful candidate will be expected to establish a productive, extramurally funded research program. À part of the 28-member Department of Molecular and Cell Biology will soon expand into a new building adjacent to the Institute. The Institute is an interdisciplinary research facility that houses the 14-member Polymer Program and the X-ray diffraction facilities. The anticipated starting date is August 2002. To apply, submit curriculum vitae, a brief statement of research and teaching interests, and arrange to have three letters of recommendation sent to: Search Committee Number Two, Institute of Materials Science, University of Connecticut, 97 North Eagleville Road, U-3136, Storrs, CT 06269-3136. Review of applications will begin after publication of this notice and will continue until the position is filled. We encourage applications from underrepresented groups including minorities, women, and people with disabilities. (Search Number 02A170)

POSITIONS OPEN

Mechanisms of behavior and evolutionary plant ecophysiology. The Department of Ecology and Evolutionary Biology at the University of Kansas invites applications for two nine-month, tenure-track positions beginning August 2002 at the ASSISTANT PROFESSOR level. We seek individuals with active research programs in (1) proximate mechanisms of behavior using insects or other arthropods and focus ing on questions at the organismal level in an evolutionary context. Possible areas include but are not restricted to behavioral genetics, neurobiology, or endocrinology. (2) Evolutionary and functional plant biology using whole-plant physiological or ecophysi-ological approaches. Possible areas include but are not restricted to comparative studies of plant form and function, the evolutionary significance of physiological adaptations, inheritance of ecophysiological traits, physiological aspects of fitness, phylogenetic analyses using physiological characters, and the evolution and physiology of plant-microbe symbioses. Candidates for both positions must have a Ph.D. (or equivalent) with postdoctoral experience preferred; are expected to develop a strong, externally funded research pro-gram; teach undergraduate- and graduate-level courses; mentor students; interact with colleagues in related disciplines; and provide service to the University. Send curriculum vitae (with e-mail address), reprints of key papers, statement of future research plans, teaching statement, and have at least three letters of recommendation sent to: Dorothy Johanning, University of Kansas, Department of Ecology and **Evolutionary Biology, 1200 Sunnyside Avenue, Lawrence, KS 66045-7534**. Review of applications will begin December 7, 2001, and continue until positions are filled. For more information, visit website: http://www.ukans.edu/~eeb. The University of Kan-sas is an Affirmative Action/Equal Opportunity Employer.

ASSISTANT PROFESSOR Microbial Ecology/Evolution

The Department of Biological Sciences at Louisiana State University and A&M College, Baton Rouge, invites applications for an anticipated tenure-track position in microbial ecology/evolution at the ASSIS-TANT PROFESSOR level available August 2002. We seek an individual who will complement our departmental strengths in systematics, ecology, and evolutionary biology. Applicants are encouraged to visit our website: http://www.biology.lsu.edu. The successful candidate is expected to have a Ph.D. or equivalent degree in a biological science or related field and postdoctoral experience. He or she will be expected to develop a strong, competitively funded research program; direct student research; and teach at the graduate and undergraduate levels. Review of applications will begin December 10, 2001, and will continue until a suitable candidate is identified. The application, consisting of curriculum vitae, one-page statements of research and teaching interests, and three letters of recommendation, should be sent to: Microbial Ecology/Evolution Search, c/o Dr. Fred Rainey, Department of Biological Sciences, Louisiana State University, Baton Rouge, LA 70803 U.S.A. E-mail: frainey@lsu.edu. Reference Log Number 0480. LSU is an Equal Opportunity/Equal Access Employer.

BIOLOGICAL OCEANOGRAPHERS

We seek two Ph.D.-level Biological Oceanographers for nine-month, tenure-track appointments at the **ASSISTANT PROFESSOR** level to begin as soon as August 2002. The positions involve research, teaching (primarily at the graduate level), and service. Area of specialization is open, but we are particularly interested in a Microbial Ecologist and a person who studies the role of nekton in ecological processes. Send a letter of application; curriculum vitae; and the names, addresses, and e-mail addresses of three references to: Biological Oceanography Search Committee, Department of Oceanography, Florida State University, Tallahassee, FL 32306. Application review will begin immediately. The University is an Equal Opportunity/Access/Affirmative Action Employer.

POSITIONS OPEN



NORTHWESTERN UNIVERSITY DEPARTMENT OF PHYSIOLOGY

The Department of Physiology at Northwestern University Medical School announces a search for two new **TENURE-TRACK FACULTY MEMBERS**. Faculty rank and salary for these full-time appointments are open. Outstanding candidates employing innovative cellular and molecular approaches to understand neuronal dendritic and synaptic function are encouraged to apply. These are the first of six new positions to be filled in this area of neuroscience with the goal of creating a highly interactive group of Investigators that complements the existing group of outstanding Neuroscientists in the Department of Physiology and Northwestern University. Successful candidates holding a Ph.D. or M.D. degree are expected to establish an independently funded research program. Start date: June 1, 2002.

Additional information about the Department of Physiology and the Northwestern University Institute for Neurosciences can be found on our websites: http://dept-www.physio.nwu.edu/physiology/ physiofr.htm and http://nuinfo.nwu.edu/ nuin/. Please send curriculum vitae; a description of research interests; and three letters of reference by December 1, 2001, to:

D. James Surmeier, Ph.D. Chair Department of Physiology Northwestern University Medical School 303 East Chicago Avenue, M211 Chicago, IL 60611

Northwestern University is an Affirmative Action/Equal Opportunity Employer. Hiring is contingent upon eligibility to work in the United States. Women and minorities are especially encouraged to apply. P-133-02, P-134-02

FACULTY POSITION MOLECULAR GENETICS DEPARTMENT OF GENETICS North Carolina State University

The Department of Genetics at North Carolina State University seeks applications at the ASSIST-ANT PROFESSOR level for a tenure-track faculty position in molecular genetics. We seek an outstanding individual employing modern molecular techniques to explore fundamental biological problems using eukaryotic model organisms. Due to current staffing, preference will be given to candidates working with organisms other than *Drosophila*. Applicants should have a Ph.D.; postdoctoral experience; and clear evidence of significant productivity, creativity, and independence. Successful candidates will be expected to develop vigorous, extramurally funded research programs; participate in the training of Ph.D. candidates; and contribute to graduate and undergraduate teaching. Additional information is available at website: http://www.cals.ncsu.edu/genetics/. Review of applications will begin November 30,

Review of applications will begin November 30, 2001, and continue until the position is filled. Applicants should forward curriculum vitae, a brief statement of research and teaching interests, copies of key publications, and arrange for three letters of recommendation to be sent to:

> Dr. Stephanie E. Curtis Molecular Genetics Search Committee Department of Genetics, Box 7614 North Carolina State University Raleigh, NC 27695-7614 E-mail: securtis@ncsu.edu

NCSU is an Equal Opportunity/Affirmative Action Employer. Americans With Disabilities Act Accommodations: Jeffrey Hawley (e-mail: jeff_hawley@nesu.edu; Telephone: 919-515-5727; FAX: 919-515-3355). In its commitment to diversity and Equity, NC State University seeks applications from women, minorities, and persons with disabilities.

Tenure-track ASSISTANT PROFESSOR of statistics with research interests and training in bioinformatics or statistical genomics starting August 2002. Ph.D. in statistics or related field required. For complete job description, see website: http://www. stat.uga.edu. Send letters of application, résumé, and four letters of reference to: Statistics Search Committee, Department of Statistics, University of Georgia, Athens, GA 30602. Review begins January 15, 2002. Affirmative Action/Equal Opportunity Employer. Applications from women and minorities are encouraged.



College of Literature, Science, and the Arts **University of Michigan** Ann Arbor, MI 48109

Director of the Biological Station

The College of Literature, Science, and the Arts at the University of Michigan solicits applications and nominations for the position of Director of the Biological Station. Although the Director resides in Ann Arbor during the academic year, she/he will normally occupy the Director's residence at the Biological Station during the summer. The University of Michigan Biological Station, located near Pellston, Michigan, encompasses a protected site of 10,000 acres of land largely undisturbed for about 100 years. It is an NSF Experimental Ecological Reserve and a U.N. International Biosphere Reserve. It supports a rich variety of ecosystems, and includes significant frontage on Douglas Lake. The Biological Station has staff, facilities, and budget to support its mission of teaching and research in terrestrial and aquatic ecology and environmental studies, especially those relating to air pollution and atmospheric warming. It is the site of several wellestablished longitudinal studies.

We seek an individual with a distinguished research record who will have credentials suitable for a tenured academic appointment in one of our Departments such as Ecology and Evolutionary Biology, Geological Sciences, or the School of Natural Resources and the Environment. The Director will play a central role in promoting interactions nationally and with other Michigan units having related missions at the University, such as the Department of Atmospheric, Oceanic, and Space Sciences. The successful candidate will have a record of intellectual and administrative leadership, and experience in obtaining grant support from public and private agencies.

The new Director will be charged with linking and rationalizing the Biological Station's curriculum relevant to departmental curricula and with increasing the use of the Station's resources in the teaching mission of the University. She/he will also be charged with expanding the range of research at the Biological Station, with the development of major research initiatives, and with increasing research funding.

Please send a letter of application, a current vita, and the names (with phone numbers and email addresses) of three references who can be contacted to: Paul G. Rasmussen, Search Committee Chair, c/o Kay Beattie, 2522 LS&A Building, 500 South State Street, Ann Arbor, MI 48109-1382. Consideration of applicants will begin on November 1, 2001, and will continue until the position is filled.

The University of Michigan is an Equal Opportunity, Affirmative Action Employer. Women and members of minority groups are especially encouraged to apply. Additional information about the Biological Station can be found at its web site, http://www.umich.edu/~umbs/

Smith College Department of Sociology World Population

The Department of Sociology and the Environmental Science & Policy (ES&P) Program invite applicants for a full-time, tenure-track appointment at the rank of Assistant Professor to begin September 2002. This joint position will be housed in the eight-person sociology department, and the successful candidate will also be expected to participate actively in the college's ES&P Program and to serve as a member of its Steering Committee. We seek a sociologist competent to teach an introductory course in World Population and a seminar for senior undergraduates in some aspect of the human-environment nexus, e.g., population studies, global change (including climate change), development, etc. The secondary teaching area is open, but teaching interests that encompass diasporic populations or the demographic (migration, race, gender) bases of global inequality would be particularly welcome. The successful candidate may be asked to teach a section of Introductory Sociology and/or, periodically, a course in basic statistics. The normal teaching load at Smith is two courses each semester. We seek a productive scholar who is enthusiastic about advising and working with undergraduates pursuing independent research projects. Familiarity with GIS technology and willingness to use Smith's Spatial Analysis Laboratory (SAL) is highly desirable (see links to ES&P and the SAL at www.science.smith.edu). Preference will be given to candidates who will have completed the Ph.D. degree by August 2002. Smith is a highly selective undergraduate liberal arts college for women with about 2,500 students located in Northampton, Massachusetts, a beautiful New England town 100 miles from Boston and 150 miles from New York City. Smith faculty members have access to the combined resources of the Five Colleges, which include Amherst, Hampshire and Mount Holyoke Colleges, and the University of Massachusetts. Applicants should send a letter describing their teaching and research interests, a curriculum vitae, and three letters of reference o: Patricia Miller, Chair, Department of Sociology, c/o Barbara Day, Secretary, Wright Hall 12, Smith College, Northampton, MA 01063. Screening of applications will begin 1 December. Smith is an equal opportunity employer encouraging excellence through diversity.

Population Genetics and **Evolutionary Genomics**

SMITH COLLEG

As part of a major campus-wide initiative in genomics at Cornell University (http://www.genomics.cornell.edu), we seek applications for a tenure-track faculty position in the molecular and quantitative aspects of population genetics and comparative and evo utionary genomics. Level is open though outstanding junior candidates are encouraged to apply. Individuals who will contribute to campus-wide programs in evolutionary, comparative, marmalian, and/or computational genomics are of particular interest. The suc-cessful candidate is expected to participate in undergraduate and graduate teaching in population genetics, comparative genomics or evolutionary genomics. The likely departmental home is the Department of Molecular Biology and Genetics. Outstanding facilities and resources are available.

Candidates should submit a CV, statement of research and teaching interests, and copies of up to five publications should be sent to:



Dr. Charles Aquadro Population Genetics Search Committee Department of Molecular Biology and Genetics 104 Biotechnology Building

Cornell University Ithaca, NY 14853

Applicants at the Assistant Professor level should also arrange for three letters of recom-mendation to be sent. Review of applicants will begin November 15, 2001, and will continue until the position is filled. Cornell University is an Affirmative Action/Equal **Opportunity Employer and Educator**

http://www.cornell.edu http://chronicle.com/jobs/profiles/2377.htm



Tenure Track Faculty Position Tumor Cell Biology

The Tumor Cell Biology Program at the Fox Chase Cancer Center seeks outstanding research investigators for a tenure track faculty position. Applications for either an Assistant Professor or more senior level appointments are welcomed. The Tumor Cell Biology Program is focused on understanding the molecular basis of cancer. Current areas of special interest include signal transduction, cellmatrix interactions, cell cycle control, and genomic stability. The successful applicant will receive a generous startup package, including funds for equipment, technical assistance, and operating expenses, and will be expected to lead a productive, independent research program.

The Fox Chase Cancer Center is an NCI-designated Comprehensive Cancer Center with strong clinical and basic science programs. The Center provides an exceptional, highly interactive, research environment supported by state-ofthe-art core facilities, extramural and intramural postdoctoral training grants, endowed fellowships, and an outstanding funding record for investigator-initiated grant applications.

To apply please send CV, a description of research accomplishments and plans, and at least 3 references (names and addresses) to: TCB Search, c/o Dr. Ann Skalka, Senior Vice President, Fox Chase Cancer Center, 7701 Burholme Avenue, Philadelphia, PA 19111. See: www.fccc.edu/scientific/research/programs/



INSTRUCTOR OR ASSISTANT PROFESSOR OF BIOLOGY College of Saint Benedict Saint John's University

The joint Biology Department of the College of St. Benedict/St. John's University is seeking to fill a three-year, full-time teaching position in introductory biology and human anatomy and physiology for students pursuing a career in allied health. Expertise in a appropriate field of biology is required. Ph.D. preferred. The teaching responsibilities include both lecture and laboratory settings. The position begins August 28, 2002, with the 2002–2003 academic year.

St. John's University, a liberal arts college for men, and the College of St. Benedict, a liberal arts college for women, are located four miles apart in central Minnesota just outside metropolitan St. Cloud and 70 miles from Minneapolis. Both are Catholic colleges in the Benedictine tradition that emphasize quality teaching and a commitment to intercultural learning.

All applicants must submit a letter of application; statement of teaching philosophy; curriculum vitae; copies of all transcripts (originals required for interview); three recent letters of recommendation; and a self-addressed, stamped envelope to:

Human Resources Coordinator Saint John's University P.O. Box 7188 Collegeville, MN 56321 E-mail: mergen@csbsju.edu

Applications received after December 15, 2001, cannot be guaranteed consideration.

The College of Saint Benedict/Saint John's University is an Equal Employment Opportunity/Affirmative Action Employers. Women and people of diverse racial, ethnic, and cultural backgrounds are encouraged to apply.

FACULTY POSITIONS Chemical and Structural Biology University of Massachusetts Medical School

A major expansion of the Program in Molecular Medicine at the University of Massachusetts Medical School includes immediate openings for SENIOR TENURED and JUNIOR TENURE-TRACK faculty positions. The Program consists of Basic and Physician Scientists representing a broad range of disciplines in the biomedical sciences. The Program will expand to fully occupy its current modern building of approximately 80,000 square feet. Instrumentation related to research in combinatorial and medicinal chemistry as well as structural biology is available. Core facilities for tissue culture, media preparation, DNA sequencing, protein chemistry and proteomics, fluorescence-activated cell sorting, digital imaging and confocal microscopy, genomics, and transgenic/ knockout mice are also available. The positions will be highly competitive with regard to start-up funds, laboratory space, and salary. The Program also seeks individuals of outstanding research potential in the broadly defined areas of cell, developmental, and molecular biology; genomics; and bioinformatics.

Applicants should send curriculum vitae, statement of research interests, and names and addresses of three references to:

Dr. Roger Davis, Search Committee Chair or Dr. Michael P. Czech, Director Program in Molecular Medicine University of Massachusetts Medical School 373 Plantation Street Worcester, MA 01605

An Equal Opportunity/Affirmative Action Employer.

TENURE-TRACK POSITION NEUROSCIENCE

POSITIONS OPEN

The University of Kentucky Medical Center The Department of Anatomy and Neurobiology is seeking applications for a tenure-track position at the ASSISTANT PROFESSOR level. The position is for an individual developing strong research programs focused on central nervous system development, regeneration, plasticity, aging, neuronal injury, drug abuse, neuropendocrinology, and/or neuroprotec-tion. Applications are invited from creative, successful individuals who want to contribute to vibrant, growing research programs within a comprehensive medical center and participate in the teaching and service mission of the Department. Successful candidates are expected to develop and maintain innovative, externally funded research programs. Competitive start-up funds, state-funded salary commensurate with experience, and modern research facilities will be provided. Special consideration will be given to applicants who complement existing departmental strengths and who will contribute to clinical research programs in the College of Medicine, the Sanders-Brown Center on Aging, and the Markey Cancer Center.

Applicants must have a Ph.D. or M.D. or equivalent degree and should have at least two years of postdoctoral experience. Interested individuals should send curriculum vitae, a summary of past experience, future research plans, and arrange for three letters of recommendation. Applications and nominations should be sent to: Dr. Rosemarie Booze, Professor, Search Committee Chair, Department of Anatomy and Neurobiology, MN225 Chandler Medical Center, University of Kentucky, Lexington, KY 40536-0298. Telephone: 859-323-6507; FAX: 859-323-5946.

The Search Committee will begin reviewing applications by November 1, 2001, and will continue until the position is filled. The University of Kentucky is an Affirmative Action/Equal Opportunity Employer. Women and minority candidates are encouraged to apply.

BEHAVIORAL NEUROSCIENTIST

The Department of Biology at Emory University is seeking a Behavioral Neuroscientist who studies the neurobiological basis of behavior and its evolutionary implications. Although the position is for a tenure-track ASSISTANT PROFESSOR, an appointment at a higher rank will be considered. The successful applicant will be provided with competitive start-up funds and research space and will be a member of the NSF Science and Technology Center for Behavioral Neuroscience. Applicants should provide evidence that they have an independent research program of broad interest and relevance and a strong record of publications in major refereed journals. A commitment to undergraduate teaching is expected and the appointee will also participate in appropriate Ph.D.-granting programs of the interdepartmental Graduate Division of Biological and Biomedical Sciences. Applicants should submit curriculum vitae and a statement detailing their current research and future plans and the names and addresses (including e-mail) of three or more individuals who could be asked for letters of recommendation. Please address applications to: Dr. John C. Lucchesi, BN Search, Department of Biology, Emory University, 1510 Clifton Road, Atlanta, GA 30322. Telephone: 404-727 4234; FAX: 404-727-2880; e-mail: beh_srch@ biology.emory.edu. Review of completed applica-tions will begin January 1, 2002. Information on the Biology Department (website: http://www.emory. edu/BIOLOGY/), the Center for Behavioral Neuroscience (website: http://www.cbn-atl.org/) and Emory's graduate programs (website: http:///www.biomed.emory.edu/) can be obtained from the Web

Emory is an Equal Opportunity/Affirmative Action Employer.

POSITIONS OPEN

ASSISTANT PROFESSOR OF BIOLOGY

Seattle University seeks candidates with expertise in cell biology or evolutionary biology for a new faculty position. The individual chosen must be a U.S. citizen with a Ph.D. in an appropriate field of biology. Successful teaching experience or clear evidence of a commitment to undergraduate teaching and research is essential. Teaching responsibilities will include introductory biology, cell biology or evolution, and upperdivision courses specific to the Instructor's interests and expertise. Located in the heart of Seattle, Washington, the University strongly encourages the faculty to develop contacts with the thriving biotechnology industry and take advantage of the close proximity of biomedical research facilities and diversity of natural habitats. With an enrollment of approximately 6,000 students, Seattle University continues a 450-year tradition of Jesuit higher education, underscoring its commitment to the centrality of teaching, learning, and scholarship. Candidates are urged to examine and reflect upon the University mission (website: http://www.seattleu.edu/about/mission.htm) as part of the application process. Applications must include curriculum vitae, statements of teaching philosophy and proposed research, copies of transcripts, three letters of reference, and a cover letter addressing how the applicant would contribute to the Biology Department and the University mission. Closing date: December 15, 2001. For more information, see website: http://www.seattleu.edu/scieng/biology/ home.html. Send all materials to: Biology Department, Seattle University, 900 Broadway, Seattle, WA 98122-4340. Contact: Daniel Matlock, Chair, Biology Deaprtment, Seattle University; e-mail: matlock@seattleu.edu; Telephone: 206-296-5487. Seattle University is an Affirmative Action/Equal Opportunity Employer.

EVOLUTIONARY DEVELOPMENTAL GENETICS University of Florida

The Department of Zoology at the University of Florida invites applications for a tenure-track ASSIS-TANT or ASSOCIATE PROFESSOR position beginning August 2002. We seek a colleague who uses an integrative approach to study evolutionary developmental genetics and who strengthens our programs in evolution, genetics, and physiology. This colleague will be expected to have or establish an internationally recognized, externally funded research program; su pervise graduate students; and teach at undergraduate and graduate levels including an undergraduate course in developmental biology. Please submit curriculum vitae, recent reprints, statements of research and teaching interests, and have three letters of reference sent to: Dr. Louis J. Guillette, Evolutionary Developmental Genetics Search, Department of Zoology, P.O. Box 118525, University of Florida, Gainesville, FL 32611-8525. Applications must be received by December 1, 2001. For more information, see website: http://www.ufl.edu/zoo evodevo or contact e-mail: evodevo@zoo.ufl.edu. The University of Florida is an Equal Opportunity Employer, and we encourage applications from minorities and women

FACULTY POSITION/NEUROSCIENCE, Center for Neuropharmacology and Neuroscience, Albany Medical College, invites applications for a tenure-track faculty position at the ASSISTANT PRO-FESSOR level. The successful candidate will be involved in ongoing research on molecular identities and mechanisms of regulation of volume-dependent anion channels in the brain and in teaching activities for medical and graduate students. We seek candidates with Ph.D. degrees and strong backgrounds in cellular physiology and molecular biology. Applicants should submit their curriculum vitae; statements of professional interest; and reprints of representative papers by December 15, 2001, and arrange to have three letters of reference sent to: Dr. Harold K. Kimelberg, Associate Director, CNN, MC-60, Albany Medical College, 47 New Scotland Ave-nue, Albany, NY 12208. The Albany Medical College is an Affirmative Action/Equal Opportunity Employer.

The Department of Biology at the University of San Francisco (USF) invites applications for a tenure-track position in genetics at the **ASSISTANT** or **ASSO**-**CIATE PROFESSOR** level to begin in August of 2002. Individuals utilizing molecular techniques to study the genetics of natural populations (and who therefore could also offer field courses) are especially encouraged to apply. For details, please see **website:** http://www.usfca.edu/biology/. USF is an Affirmative Action/Equal Opportunity Employer.

ECOLE POLYTECHNIQUE ECOLE POLYTECHNIQUE At the Swiss Federal Institute of Technology Lausanne (EPFL)

The EPFL, in close collaboration with the universities of Geneva and Lausanne, plans a major expansion at the interfaces between life, basic and engineering sciences that involves the creation of a centre of functional genomics.

As part of this broad program, the EPFL will establish the "Brain and Mind Institute" and anticipates making several appointments at the assistant (tenure-track) and full professor level.

The mission of the Brain and Mind Institute is to combine basic sciences and state of the art engineering technologies to study higher brain functions. Research on campus will span from investigation of single molecules to analysis of complex systems and ample opportunities for synergies will be available.

Outstanding individuals, with an interdisciplinary vision and a strong record of accomplishments, are invited to apply. Successful candidates will initiate independent, creative research programs and participate in both undergraduate and graduate teaching. Substantial start-up resources will be available.

For the next appointments, an **emphasis** will be placed on electrophysiology of neural coding, **computational neuroscience**, imaging, behavioural genetics, **and** vertebrate as well as invertebrate genetic models of neuronal development and disease.



Applications, including curriculum vitae, publication list, brief statement of research interests (three pages or less) and names and addresses (including e-mail) of at least seven references should be sent to:

The office of the President EPFL CH-1015 Lausanne, Switzerland.

For inquiries, contact: life.sciences@epfl.ch.



UCLA Tenure-Track Positions, Physiology (2)

The Department of Physiology at the UCLA School of Medicine invites applications for two tenure-track faculty positions, preferably at the level of Assistant Professor.

The first position involves research in molecular physiology including functional genomics, proteomics, or transgenic approaches. Candidates are expected to have a strong background in cellular and molecular biology and the application of genetic approaches to the study of physiological systems.

The second position is targeted for research in molecular cardiology, possibly in the area of cardiac development or cell cycle regulation though all areas will be considered. Candidates are expected to have a strong background in molecular biology including, e.g., genetic engineering or gene array technology. An interest in integrating computational and experimental biology is desirable. The successful candidate will be a member of the interdisciplinary UCLA Cardiovascular Research Laboratory.

The successful candidates will be expected to develop independent research programs and participate in the teaching mission of the Department for medical, dental, and graduate students.

Applicants should email their curriculum vitae, a letter with a statement of research interests and career goals, and the names of three references to PhysiologySearch@mednet.ucla.edu.

UCLA is an Affirmative Action/Equal Opportunity Employer. Women and minorities are encouraged to apply.

Facility Head Proteomics Core (Staff Scientist)

The National Institute of Dental and Craniofacial Research (NIDCR) at NIH is searching for a staff scientist to pursue research in proteomic discovery.

The successful candidate will be responsible for running a core facility for the NIDCR intramural scientific program. Opportunity to pursue collaborative research projects will also be made available. Candidates should have a Ph.D., D.D.S., M.D. or equivalent with at least three years experience with protein separation (e.g. 2D-PAGE, HPLC or CE) and the identification of proteins using mass spectrometry. Familiarity with bioinformatic approaches to protein analysis is also desirable.

For more information regarding this position please contact Dr. Henning Birkedal-Hansen, Scientific Director, NIDCR (301) 496-1483 or hbhansen@dir.nidcr.nih.gov

To apply please send a copy of your curriculum vitae, a one-two page summary of your current research interests and names and addresses of three references, no later than December 31, 2001.

Human Resources Management Branch, NIDCR Attn: Ms. Judy Dulovich 31 Center Drive 31/2C39 Bethesda, MD 20892-2290

> Telephone: 301-496-6971; Fax 301-402-4088; E-mail: Judith.dulovich@nih.gov

NIH is an Equal Opportunity Employer

PLANT PHYSIOLOGY/PLANT DEVELOPMENT

The College of William and Mary's Department of Biology invites applicants for a tenure-track position at the ASSISTANT PROFESSOR level in plant physiology and/or plant development. The successful candidate will be expected to maintain an extramurally funded research program involving both undergraduate- and Master's-degree students. Setup funds will be provided. Teaching responsibilities are a plant physiology course with laboratory, a large course in general botany to be taught in alternate years, and another course in the area of candidate's expertise (perhaps plant development) to alternate with general botany. Candidates must possess skills in communicating with and motivating undergraduates in both large and small courses and must demonstrate the potential and motivation to achieve excellence in teaching. Previous experience teaching undergraduate courses would be viewed favorably, and postdoctoral research experience is expected.

Information on the College of William and Mary may be obtained at website: http://www.wm.edu. Review begins November 26, 2001, and will continue until an appointment is made. Submit a letter of application, curriculum vitae, statement of research plans and teaching philosophy, and three letters of reference to: Plant Physiology/Development Search Committee, Department of Biology, The College of William and Mary, P.O. Box 8795, Williamsburg, VA 23187-8795. The College is an Equal Opportunity/Affirmative Action Employer.

The Department of Pharmacology and Toxicology at Virginia Commonwealth University seeks a collateral **RESEARCH ASSOCIATE** to help manage the daily activities of a diverse laboratory group using genomic approaches to study the neurobiology of drug abuse. This will include daily supervision of laboratory members as well as full participation in the development and preparation of manuscripts and grants. The successful applicant will possess a Ph.D. or equivalent in molecular biology or biochemistry and at least three years of postdoctoral experience in addition to extensive hands-on experience in molecular biology, particularly concerning regulation of gene expression. Also critical are experience with use and analysis of oligonucleotide microarray (Affymetrix) data and promoter mapping/characterization (including accessing and manipulating biological computerized databases). Experience with neuronal cell culture and behavioral neurobiology is preferred. Considerable ability to function in an independent and creative manner is expected as is skill at laboratory management and manuscript preparation. Applicants should submit curriculum vitae and the names of three references by December 5, 2001, to: Search Committee (F6193), Virginia Commonwealth University, P.O. Box 980613, Richmond, VA 23298-0613. Position description available. Virginia Commonwealth University is an Equal Opportunity/Affirmative Action Employer. Women, minorities, and persons with disabilities are encouraged to apply.

ASSISTANT PROFESSOR OF BIOLOGY TENURE-TRACK POSITION Immunology

The Department of Biology, Winthrop University, invites applications from qualified persons holding the Ph.D. degree or who will complete the Ph.D. by July 1, 2002, in immunology or a closely related field for this position that will open August 16, 2002. Responsibilities include teaching immunology, our majors investigative course, and other biology courses. Applicants should provide a letter of application, curriculum vitae, a statement of the candidate's teaching philosophy and future research plans, graduate transcripts (unofficial acceptable), and three confidential letters of reference by January 15, 2002. Application materials should be sent to: Dr. Ralph A. Gustafson, Chair, Biology Department, 202 Life Sciences Building, Winthrop University, Rock Hill, SC 29733. Winthrop University is an Equal Opportunity/Affirmative Action Employer.

POSITIONS OPEN

FACULTY POSITION ECOSYSTEM ECOLOGY Yale University

The School of Forestry and Environmental Studies at Yale University invites applications for a laddertrack appointment in ecosystem ecology. Applicants who examine the linkages between natural or humancaused disturbances and biogeochemical processes and global change are highly desirable. A record of accomplishment and a promising research program are more important than the specific study focus.

The successful candidate's laboratory will be located in a completely new environmental science facility that houses a new, shared stable isotope laboratory and is home to faculty from our school, the Departments of Geology and Geophysics, and Ecology and Evolutionary Biology.

Interested candidates should submit curriculum vitae, three relevant reprints or manuscripts, a brief statement of research, a statement of teaching philosophy and interests, and the names and addresses of three references by December 15, 2001. Send all materials to:

Oswald J. Schmitz, Chair Ecosystem Ecology Search Committee School of Forestry and Environmental Studies 370 Prospect Street New Haven, CT 06511 E-mail: oswald.schmitz@yale.edu

Yale University is an Equal Opportunity/Affirmative Action Employer.

UNIVERSITY OF CALIFORNIA SAN DIEGO Division of Biology Section of Molecular Biology

The Section of Molecular Biology in the Division of Biology at UCSD invites outstanding candidates who have demonstrated ability in one of the various fields of molecular biology to apply for a tenure-track **AS-SISTANT PROFESSOR** position. These fields include but are not limited to immunology, microbiology, pathology, and structural biology; any and all relevant fields will be seriously considered. The primary criteria for selection will be research excellence and potential. All candidates must have a Ph.D., M.D., or an equivalent degree and the ability to teach at the undergraduate and graduate levels. The level of appointment will be commensurate with qualifications and experience with salary based on University of California pay scale.

Applications received by December 10, 2001, will be assured of consideration. Send curriculum vitae; complete list of publications; brief description of research interests and professional goals; and the names, addresses, e-mail addresses, telephone, and FAX numbers of at least three references to: Molecular Biology 0346, University of California, San Diego, 9500 Gilman Drive, La Jolla, CA 92093-0346. UCSD is an Affirmative Action/Equal Opportunity

Employer.

DIRECTOR, GENOMICS FACILITY University of California, San Francisco

The Program in Human Genetics offers a senior position (nonfaculty) as Director of its Genomics Core Facility. The facility provides DNA sequencing, genotyping, and mutation detection services to labo ratories working in vertebrate genetics. Requirements are a Ph.D. degree or equivalent, genomics postdoctoral experience or equivalent, and ability to interface with genomic Researchers. Management and supervisory experience desirable. The position starts after January 15, 2002. Send a cover letter; curriculum vitae; at least three reference letters; and relevant reprints by December 1, 2001, to: Laura Baxter, Biochemistry and Biophysics Department, UCSF, 513 Parnassus Avenue, Room S-960, San Francisco, CA 94143-0448. The University of California, San Francisco, is an Equal Opportunity/Affirmative Action Employer. Women and minorities are encouraged to apply.

POSITIONS OPEN

The Department of Biology at Vassar College invites applications for a tenure-track faculty position at the level of ASSISTANT PROFESSOR in an area of biology in which bioinformatics plays an important role. Research interests may include but are not limited to the following areas: microbiology, cell biology, molecular biology, physiological systems, protein biochemistry/proteomics, evolution, and functional or comparative genomics. We seek an outstanding Teacher and Investigator who incorporates informatic approaches to study fundamental aspects of biology. The candidate should expect to teach at all levels of the curriculum and to work with the Department towards integrating bioinformatics into the curriculum. Development of a research program with student participation is expected and start-up funding is provided. A Ph.D. in biological science with demonstrated proficiency in bioinformatics is required and postdoctoral experience is preferred. This position is funded in part by a grant from the Howard Hughes Medical Institute to Vassar College. Applicants should submit curriculum vitae; a list of publications and representative reprints; a statement of research interests and goals; a statement on teaching philosophy and interests; and four letters of reference by December 1, 2001, to: David Jemiolo, Chair, Department of Biology, Box 731, Vassar College, Poughkeepsie, NY 12604. E-mail: jemiolo@vassar.edu; website: http://depts. vassar.edu/~biology/. Vassar College is an Affirmative Action/Equal Opportunity Employer.

FACULTY POSITIONS

The University of Arkansas invites applications for two tenure-track positions in cellular, molecular, or developmental biology. Appointees will join the Department of Biological Sciences and the Center for Protein Structure and Function (website: http:// www.uark.edu/protein) and also participate in the Program for Cell and Molecular Biology (website: http://www.uark.edu/depts/cemb/cemb.html). Examples of research areas include but are not limited to cellular receptors and transporters, transcription, translation, chromatin structure, and signal transduction. Successful candidates must have a Ph.D. and postdoctoral experience and will be expected to establish and maintain an extramurally supported research program, supervise graduate students, and teach at the graduate and undergraduate levels. Review of completed applications will begin November 19, 2001, and will continue until the positions are filled. Applications should include curriculum vitae, a statement of research interests and teaching interests, reprints of published papers, and at least three letters of recommendation. Application materials should be addressed to: Dr. Ralph Henry, Search Committee Chair, Department of Biological Sciences, Room 19 WAAX, University of Arkansas, Fayetteville, AR 72701. The University of Arkansas is an Equal Opportunity/Affirmative Action Employer. Applicants must have proof of legal authority to work in the United States at the time of hire.

VERTEBRATE PHYSIOLOGIST, Lycoming College. The Department of Biology invites applications for a tenure-track position at the ASSISTANT PROFESSOR level for fall 2002. We see an Animal Physiologist with expertise in terrestrial vertebrate studies. Teaching responsibilities will include an intermediate-level course in human physiology, advanced course(s) in an area of expertise that should include at least one course in field biology, and contribution to our introductory biology sequence. Successful candidates must have a Ph.D., a strong commitment to teaching, and the ability to establish an active undergraduate research program. For more information, please visit the Department website: http:/ www.lycoming.edu/dept/biology/bio.html. Submit a letter of application; curriculum vitae; transcripts; statement of teaching philosophy; synopsis of research interests; and three letters of reference by December 1, 2001, to: Dr. Mel Zimmerman, Chair, Biology Department, Lycoming College, 700 Col-lege Place, Williamsport, PA 17701. Lycoming College is an Equal Opportunity Employer.



UNIVERSITY OF PENNSYLVANIA School of Dental Medicine ASSISTANT or ASSOCIATE PROFESSOR BIOCHEMISTRY

The Biochemistry Department at the University of Pennsylvania School of Dental Medicine seeks a tenure-track Assistant or Associate Professor with research interests in any area of Biochemistry or Molecular Cell Biology. The successful applicant at the Assistant Professor level will be able to develop, or at the Associate Professor level will already have an independent, externally funded research program, and will have demonstrably strong teaching skills. Our Department (http://biochem.dental.upenn.edu/biochem/) is part of a vibrant research community within the School of Dental Medicine, and has strong interactions with nearby colleagues at the Schools of Medicine, Veterinary Medicine, Engineering and Arts and Sciences. A competitive start-up package is available, however, applicants at the Associate Professor level must already have a good record of extramural support. Requirements include a strong record of research accomplishment, a Ph.D. in Biochemistry or Molecular Biology, and at least two years of postdoctoral experience.

Applications are particularly invited from individuals who also have clinical degrees (M.D. or D.M.D.). Applications should include a statement of research interests, curriculum vitae, bibliography, and a list of three referees. The completed application should be sent to:

Dr. Ellis E. Golub Professor and Chair of Biochemistry University of Pennsylvania School of Dental Medicine 4001 Spruce Street Philadelphia, PA 19104.

E-mail applications in the form of Microsoft Word, WordPerfect or Adobe Acrobat (PDF) files can be sent to: **ellis@biochem.dental.upenn.edu.** Applications will be reviewed starting December 1, 2001.

PENN is an Equal Opportunity/Affirmative Action Employer. Applications are encouraged from qualified females and minorities.



Advancing Knowledge, Saving Lives

Sr. Vice President and Director for the Division of Public Health Sciences, Fred Hutchinson Cancer Research Center

The Fred Hutchinson Cancer Research Center invites applications and nominations for the position of Senior Vice President and Division Director for their Public Health Sciences Division. The Division Director reports directly to the President & Director of the Center and is responsible for scientific and administrative guidance of activities within the Division. The Division has research programs in Biostatistics, Cancer Prevention, Epidemiology, and Cancer Biology. The Director's responsibilities include divisional strategic planning, recruitment, space allocation, and oversight of more than 50 faculty and \$50 million in grant base. The Director also provides institutional guidance through his/her role on the six-member senior vice president committee. The Division will be moving to a new building occupying 350,000 sq. feet of office and laboratory space with room for new recruitments in 2004.

Qualifications for the position include an international reputation for scientific excellence and accomplishments, and experience in leading a scientific faculty.

A joint appointment in the University of Washington School of Public Health and Community Medicine is possible depending on interests and qualifications.

The Fred Hutchinson Cancer Research Center and the University of Washington are equal opportunity/affirmative action employers. Both institutions are building culturally diverse faculty and strongly encourage women and people of color to apply.

Compensation is dependent upon experience.

Please send letters of application with curriculum vitae via e-mail only to: phsdirad@fhcrc.org. Any attached documents must be in Word format.



SCHOOL OF MEDICINE

Two Tenure Track Faculty Positions Physical Chemistry of Biological Macromolecules Regulation of Gene Expression

As part of an ongoing rebuilding program, the Department of Biochemistry and Molecular Biology invites applications to fill faculty positions in the areas listed above. Although emphasis will be on junior faculty, we will consider applicants at all levels. For the first position, we seek an individual with research interests in the biophysical properties of proteins or nucleic acids. For the second position, we seek someone studying fundamental regulatory processes at the molecular level. Successful applicants will be expected to develop a research program using modern biochemical, molecular biological and biophysical techniques to address a significant biological problem. Generous start-up packages and laboratory space are available to initiate the research programs.

Applicants should have a doctoral degree and relevant postdoctoral experience. Excellence in research and clear indications of an ability to initiate a strong research program are essential. Candidates should also be able to function effectively as a lecturer and in informal teaching at all levels.

Interested individuals should send a complete curriculum vitae, three letters of recommendation, a brief description of previous research experience and future research plans, and reprints of most significant work to: Dr. Murray Deutscher, Faculty Search, University of Miami School of Medicine, P.O. Box 016129, Miami, FL 33101-6129

Review will begin immediately and will continue until the positions are filled. Please indicate the position for which you are applying.

Two Canada Research Chairs, Department of Zoology, University of Toronto

Outstanding applicants are sought for two tenure stream appointments, rank open. **Evolutionary geneticist**, preferably doing experimental work in population or quantitative genetics, to bridge existing strengths in the Department in evolutionary and population biology.

Experimental neurobiologist, preferably working on invertebrate systems using both physiological and molecular genetic approaches. The ideal candidate would interact profitably with strong existing groups in developmental biology and comparative physiology within the Department.

There is a large community of comparative physiologists, neurobiologists and developmental biologists at the University, with superb facilities for functional or comparative genomics/proteomics.

We will nominate the successful applicants for Canada Research Chairs (Tier I or Tier II, as appropriate: http://www.chairs.gc.ca). These federally endowed chairs are open to all nationalities. Tier I Chairs are for prominent senior researchers; Tier II Chairs are for assistant and associate professors with extraordinary potential. The Department plans three additional CRC appointments in comparative/evolutionary biology for 2002-3.

By 14 December 2001, candidates should send a curriculum vitae, statements on research and teaching, and have three recommendation letters sent to:

Department of Zoology Evolutionary Genetics or Neurobiology Search University of Toronto 25 Harbord St. Toronto, ON. M5S 3G5 Canada

Direct queries to: Locke Rowe (Evolutionary Genetics: lrowe@zoo.utoronto.ca) or Stephen Tobe (Neurobiology: stephen.tobe@utoronto.ca). Information on the Department of Zoology can be found at http://www.zoo.utoronto.ca

The University of Toronto is strongly committed to diversity within its community and especially welcomes applications from visible minority group members, women, Aboriginal persons, persons with disabilities, members of sexual minority groups, and others who may contribute to the further diversification of ideas.

WETLAND ECOLOGIST AND ENVIRONMENTAL GEOLOGIST George Mason University

The Environmental Science and Policy Program invites applications for two tenure-track **ASSIS TANT PROFESSORS** for fall 2002. The successful candidates will pursue active, externally funded research programs; aspire to excellence in teaching; and engage in interdisciplinary collaboration. Special consideration will be given to candidates with expertise in GIS/spatial analysis, landscape ecology, or modeling. A Ph.D. is required.

Wetland Ecologist: Research experience should be in wetland ecology or biogeochemistry. Teaching duties include a graduate course in wetland ecology and contributions to the undergraduate environmental science curriculum.

Environmental Geologist: Research experience should be in one or more of the following: geochemistry, soil science, hydrology, geologic hazards, or global change. Teaching duties include a graduate course in the area of specialization as well as contributions to the undergraduate geology program.

The ESP Program offers M.S. and Ph.D. degrees in environmental science and policy, undergraduate degrees in Earth science/geology, and undergraduate and graduate certificates in environmental management. Our faculty includes Ecologists, Microbiologists, Geologists, Earth Scientists, Oceanographers, and Sociologists. Additional information on the Department and the University may be found at websites: http://mason.gmu.cdu/~espp and http:// www.gmu.cdu respectively.

Candidates should submit curriculum vitae, letter of intent including statements of research interests and teaching goals, and names and contact information for three references to: Chair, Wetland Ecologist or Environmental Geologist (specify one) Search Committee, Environmental Science and Policy Program, MS 5F2, George Mason University, 4400 University Drive, Fairfax, VA 22030-4444. Application deadline is 31 December 2001.

George Mason University is an Affirmative Action/Equal Opportunity Employer. We strongly encourage women and minority candidates to apply.

The Department of Neuroscience at the University of Pennsylvania School of Medicine invites applications for two tenure-track faculty positions in cellular and molecular neuroscience. Rank is open to tenuretrack ASSISTANT, ASSOCIATE, or FULL PRO-FESSORS. Appointment will be commensurate with credentials and experience. For one position, candidates using cellular and molecular approaches to study any aspect of neuronal development in vertebrates or invertebrates are encouraged to apply. For a second position, we seek individuals working on the molecular biology of complex behaviors with emphasis on sleep and chronobiology. This includes the analysis of neuropeptide and neurotransmitter systems implicated in the regulation of sleep and circadian rhythms, studies of learning and memory or synaptic plasticity that may be relevant to sleep, and the use of genomic/ proteomics approaches to study behavior

Electronic submission of all materials (including supporting letters) as PDF, Word, or WordPerfect file attachments is strongly preferred. Applicants should submit curriculum vitae and a statement of research interests and arrange for three letters of recommendation to be sent directly to e-mail: neurojob@ mail.med.upenn.edu. Send paper applications (only if necessarv) to:

Neuroscience Search Department of Neuroscience 215 Stemmler Hall 3420 Hamilton Walk University of Pennsylvania School of Medicine Philadelphia, PA 19104-6074

Applications will be accepted until the position is filled. Early application is encouraged because applications will be evaluated as soon as they are complete. The University of Pennsylvania is an Equal Opportunity/

Affirmative Action Employer. Women and minorities are encouraged to apply.

POSITIONS OPEN

FACULTY POSITIONS Grand Valley State University Department of Biomedical and Health Sciences

The Department of Biomedical and Health Sciences is now recruiting for three tenure-track faculty to begin in the fall 2002 semester. Grand Valley State University is a state-supported university with a primary commitment to undergraduate education, both in the classroom and in the research laboratory. As such, we are seeking faculty who are committed to excellence in teaching and in research as a teaching tool for our students. For each position listed below, the successful candidate will have the appropriate Ph.D. and have demonstrated teaching and research experience. Each is a nine-month position.

ASSISTANT, ASSOCIATE PROFESSOR: physiology/pharmacology. Individuals must be qualified to teach human physiology and accompanying laboratory courses at the undergraduate and graduate levels. The successful candidates will develop research programs that involve undergraduate students and will help develop new physiology and pharmacology emphases in the Department.

ASSISTANT, ASSOCIATE PROFESSOR: clinical microbiology. Individual must be qualified to teach microbiology, epidemiology, and public health courses at the undergraduate and graduate levels. The successful candidate will be expected to develop a research program that will involve undergraduate students and help implement a new microbiology emphasis in the Department.

ASSISTANT, ASSOCIATE PROFESSOR: anatomy. Individual must be qualified to teach human anatomy and accompanying human cadaver laboratories. Expertise in histology, neuroanatomy, or embryology desirable. The successful candidate will develop a research program that involves undergraduate students.

Interested candidates should submit a letter of intent describing their teaching philosophy and research interests, current curriculum vitae, and the names of three references to: Miles Hacker, Ph.D., Chair, Department of Biomedical and Health Sciences, 327 Padnos, Grand Valley State University, Allendale, MI 49401. E-mail: hackerm@gvsu.edu. Review process will begin on December 3, 2001, and will continue until the positions are filled. Grand Valley State University is an Affirmative Action/Equal Opportunity Institution.

LECTURER Department of Surgery Surgical Research

M.S., M.A., M.P.H. for full-time, salaried position as Lecturer. Duties include investigating/identifying funded research opportunities for discipline in surgery; development of projects; and preparation in grant proposals in addition to teaching grantsmanship to faculty, residents, and medical students. Five years of experience in medical/grant writing; command of written English; knowledge of federal grant submission processes, computer-based search tools/bibliographies; and ability to interact with a variety of profes sionals and organizational skills essential. Deadline: December 31, 2001. Send curriculum vitae to: Dr. Michael Ricci, Director of Surgical Research, Department of Surgery, Given Building D319, University of Vermont, Burlington, VT 05405. An Equal Opportunity/Affirmative Action Employer. Applications from women and people with diverse racial, ethnic, and cultural backgrounds are encouraged.

Sigma Xi, a leading scientific honor society, is seeking an exceptional leader as their **EXECUTIVE DI-RECTOR**. This position offers an opportunity to plan, develop, and lead comprehensive strategic planning to foster a creative and dynamic interaction among science, technology, and society. It requires an effective communicator and consensus builder with an appreciation of science, research, solid business savvy, knowledge of public relations/marketing, and good fund-raising/membership-building skills. Please contact: **Grantham Griffin & Buck; e-mail: buck@ggbinc.com; Telephone: 919-932-5650**.

POSITIONS OPEN

TERRESTRIAL ECOSYSTEM SCIENTIST DEPARTMENT OF ECOLOGY AND EVOLUTIONARY BIOLOGY Cornell University

The Department of Ecology and Evolutionary Biology invites applications for a TENURE-TRACK **POSITION** in ecosystem science. The Department seeks a broadly trained and creative Terrestrial Ecosystem Scientist or Biogeochemist to complement current strengths as well as add further diversity to the Department's faculty. The successful applicant will have the opportunity to participate in substantial universitywide initiatives in biogeochemistry, biocomplexity, and environmental change. An interest in both basic science and its application to environmental problems is desirable. The successful candidate will have a diverse research program and a strong interest in teaching. Teaching responsibilities will include participation in general ecology and upper-level ecosystem science courses. Although the position can be filled at any rank, we are especially interested in applicants at the junior level. The position will be available beginning fall 2002. Applicants should send curriculum vitae, copies of representative publications, statements of teaching and research interests, and a description of future research plans. They should also make arrangements to have three letters of recommendation sent to: Search Committee, Department of Ecology and Evolutionary Biology, Cornell University, Corson Hall, Ithaca, NY 14853-2701. Please include with application materials names, telephone numbers, and e-mail addresses of references. We will begin reviewing applications on December 10, 2001. Inquiries about the position should be directed to: Patricia L. Jordan, Search Committee Assistant; e-mail: pj17@cornell.edu or Peter L. Marks, Professor; e-mail: plm6@ cornell.edu. Information about the Department can be found at website: http://www.eeb.cornell.edu.

Cornell University is an Equal Oopportunity/Affirmative Action Employer. Applications from women and minorities are encouraged.

ASSISTANT PROFESSOR Aquatic Biology/Ichthyology

Tenure-track position for fall 2002. Teaching includes introductory zoology and upper-level courses such as aquatic ecology and ichthyology research involving undergraduates expected. See Website below for full description. Send curriculum vitae, statement of teaching and research interests, up to three reprints, and have three reference letters sent to:

> Dr. Sam Zeveloff, Chair Department of Zoology c/o Human Resources Department Weber State University Ogden, UT 84408-1016 Telephone: 801-626-6165 FAX: 801-626-7445 E-mail: szeveloff@weber.edu

Website: http://www.weber.edu/zoology Application deadline is November 16, 2001. Weber State University is an Affirmative Action/Equal Opportunity Employer.

ASSISTANT/ASSOCIATE PROFESSOR Center for Pharmacogenetics The University of Pittsburgh

The newly established Center for Pharmacogenetics in the School of Pharmacy seeks outstanding Investigators to fill a tenure-track-eligible position. It is a full-time, 12-month appointment. Successful candidates must have a Ph.D. and/or M.D. as well as an excellent research record in pharmacogenetics and/or pharmacogenomics. Rank and salary will be commensurate with qualifications and experience. Send curriculum vitae; three letters of recommendation; and a statement of research interest by December 1, 2001, to: Dr. Leaf Huang, University of Pittsburgh, 3501 Terrace Street, 633 Salk Hall, Pittsburgh, PA 15213.

DUQUESNE UNIVERSITY

DEAN Bayer School of Natural and Environmental Sciences DUQUESNE UNIVERSITY

Duquesne University invites applications and nominations for the position of Dean of the Bayer School of Natural and Environmental Sciences. The Bayer School includes the Departments of Biological Sciences, Chemistry and Biochemistry, and Physics, as well as the Center for Environmental Research and Education.

Candidates are sought with the vision, energy and leadership ability to work collegially and effectively to continue the unprecedented growth of the School and its programs.

Duquesne University has nearly 10,000 students in its nine Schools. Its attractive campus overlooks the city of Pittsburgh, one of America's most livable cities.

Applications should be submitted by December 10, 2001. Minority and female candidates are encouraged to apply. Application and nomination materials, including a curriculum vitae, should be sent to:

Dean R. Pete Vanderveen, Chair Bayer School of Natural and Environmental Science Search Committee Duquesne University 306 Bayer Learning Center Pittsburgh, PA 15282

For additional information, visit our web site at http://www.duq.edu

Founded by the Holy Ghost Fathers in 1878, Duquesne University is Catholic in mission and ecumenical in spirit. The University values equality of opportunity both as an educational institution and as an employer.



Review Scientists (Multiple positions)

CFSAN The Center for Food Safety and Applied Nutrition (CFSAN) in the Food and Drug Administration (FDA) is recruiting review scientists. CFSAN's Office of Food Additive Safety (OFAS) is responsible for the review and evaluation of scientific and technical data and information submitted in support of the safe use of various categories of food substances. OFAS is seeking qualified scientists with the following areas of expertise in endocrinology, genetic toxicology, herbals/pharmacognosy, reproductive toxicology, and general toxicology.

The primary duty of a review scientist is to evaluate safety data contained in submissions, such as food additive and color additive petitions, generally recognized as safe notifications, premarket notifications for food contact substances and notifications for foods derived from new plant varieties. Review scientists also provide written and verbal assistance, within their area of expertise, to other FDA scientists, US citizens, the regulated industry, Congress, international fora and other interested parties. The incumbent may participate in formulating and or revising guidelines for conduct of toxicity studies used in assessing the safety of food ingredients. Incumbents may also contribute to the development of regulations and policies to implement the Federal Food, Drug, and Cosmetic Act and the National Environmental Policy Act. (These are NON-LABORATORY positions located in the DC Metro area.)

Salary Range: \$ 44,352 to \$ 82,180 per annum, plus an excellent benefits package and flexible work schedule. Salary, benefits and levels of responsibility are commensurate with education and experience.

How to Apply: Interested applicants, current federal employees and reinstatement eligibles should visit our website at www.usajobs.opm.gov/a9fda.htm for copies of the announcements.

Applicants who have never been permanently employed by the Federal government may apply to the following vacancy announcements:

PHARMACOLOGIST GS-0405 FDA-7-0906 http://www.usajobs.opm.gov/wfjic/jobs/BU3682.HTM

BIOLOGIST GS-0401 FDA-7-0905 http://www.usajobs.opm.gov/wfjic/jobs/BU3677.HTM

These documents can be obtained via FAX by calling 301-827-4287.

AN EQUAL OPPORTUNITY EMPLOYER; A SMOKE-FREE WORKPLACE

Send an original application to: Food and Drug Administration, 5600 Fishers Lane, Room 7B-44, Rockville, MD 20857. In addition, send a copy of the original application to: Food and Drug Administration, CFSAN/OFAS HFS-200, 200 C Street, S.W., Washington, DC 20204, Attn: Brenda Finch

Ralph O. Mumma Endowed Professorship in Entomology Tenure Track Penn State University

Seeking a preeminent senior scientist of broadly recognized international stature to provide innovative leadership in Chemical/Molecular Ecology. RESEARCH (80%): Conduct innovative and internationally recognized research in chemical ecology that addresses environmental quality or pest management. Opportunities to link with University-wide graduate and postgraduate training areas in Environmental and Life Sciences Consortia, Environmental Resources Research Institute and several Centers such as Environmental Chemistry, Geochemistry, etc. TEACHING (20%): Participate in team taught courses that lead expanding emphasis on biological and chemical specialization in the applied sciences. Ph.D. with international recognition. Position will be filled at the Professor level. Closing Date: December 31. 2001, or until a qualified candidate is identified

Submit letter stating research/teaching interests and goals, CV, and names and addresses of five professional references to: Dr. Gary W. Felton, Head, Department of Entomology, Box S, Penn State University, 501 ASI Bldg., University Park, PA 16802.

Penn State is committed to Affirmative Action, Equal Opportunity and the Diversity of its workplace.

TENURE TRACK FACULTY POSITION IN NEUROSCIENCE The Department of Anatomy The University of California, San Francisco

The Department of Anatomy at the University of California seeks applicants for a tenure track appointment in Neuroscience. The primary criterion for appointment will be outstanding potential in the general area of developmental or cellular neuroscience. The successful applicant is expected to develop a dynamic research group in basic neuroscience, and will become a member of the interdepartmental Neuroscience Program at UCSF, within the Program in Biological Sciences (PIBS). Faculty members will also participate in professional and graduate teaching.

Applicants must hold PhD or MD degrees, have relevant postdoctoral experience, and a strong record of published research in neuroscience. Although the emphasis will be placed on recruiting Assistant Professors, outstanding applicants at the Associate Professor and Professor levels may also be considered.

Please send written applications, prior to December 7, 2001, including curriculum vitae, a twopage statement of research interests, and three letters of reference to: Search Committee, Department of Anatomy, University of California San Francisco, 513 Parnassus Avenue, Box 0452, San Francisco, CA 94143-0452

UCSF is an Affirmative Action/Equal Opportunity Employer. The University undertakes affirmative action to assure equal employment opportunity for underutilized minorities and women, for persons with disabilities, and for Vietnamera veterans and special disabled veterans.



The Department of Biological Science is pleased to announce the establishment of the J. Herbert Taylor Distinguished Professorship in Molecular Biology We invite nominations of and applications from proven scholars at the FULL PROFESSOR or equivalent level who explore the complexities of gene action; nuclear-cytoplasmic interaction; or higher-order chromosome and/or nuclear structure as a way of understanding fundamental problems in cellular reproduction, differentiation, or function. This search is an initial step in a planned expansion in the broadly defined area of molecular biology within the Department designed to augment our existing strengths in cell biology, evolution, neuroscience, and ecology. The successful candidate will be expected to play a significant role in charting our growth in molecular biology and its related fields. Recent major state support for acquisition of instrumentation has established state-of-the-art core facilities in the Department and related units for molecular technology, nucleic acid and peptide sequencing, proteomics, microarray anal-yses, monoclonal antibody production, analytical biochemistry, and sophisticated imaging by light and electron microscopy. Members of the Department are affiliated with interdisciplinary programs in structural biology, molecular biophysics, neuroscience, and computational science and information technology as well as with the National High-Field Magnet laboratory and the newly established College of Medicine. The position carries an attractive package of salary and benefits, research space, initial research support, and recurring funds generated by the endowment to enhance the Chairholder's research program. Our website: http://www.bio.fsu.edu provides additional information about the Department and links to related programs.

Nominations and letters of interest in the position should be directed to: J.H. Taylor Distinguished Professor Search Committee, Department of Biological Science, Florida State University, Tallahassee, FL 32306. Review of these materials will begin December 1, 2001, and continue on a rolling basis.

Florida State University is an Equal Opportunity/Affirmative Action Employer committed to diversity of hiring and a Public Records Agency.

TENURE-TRACK ASSISTANT PROFESSOR University of Minnesota

The University of Minnesota Center for Immunology and the Department of Medicine invite applications for a tenure-track Assistant Professor position from candidates with a strong research program in the area of human or mouse autoimmune disease as part of a new program in autoimmunity. Candidates must have an M.D. or M.D. /Ph.D. degree, clinical training in internal medicine and rheumatology, and a minimum of three years of postdoctoral experience. They must have demonstrated the ability to carry out highquality research with publications in top journals in the area of autoimmunity and will be expected to develop a strong, extramurally funded research program. We especially seek candidates with experience in the genetics of autoimmune diseases, the generation and characterization of transgenic and knockout mice, and/or functional genomics relating to autoimmunity. Strong emphasis will be placed on candidate's potential for interactions with other faculty. Salary and start-up funds will be competitive.

Applications should include current curriculum vitac, statement of research interests, and three letters of reference. Please send to: Dr. Timothy W. Behrens, Department of Medicine, University of Minnesota, Mayo Mail Code 334, 312 Church Street, S.E., Minneapolis, MN 55455. Last date for receipt of applications is December 12, 2001.

The University of Minnesota is an Equal Opportunity Educator and Employer.

POSITIONS OPEN

POSITIONS AVAILABLE: The Department of Microbiology and Medical Zoology, School of Medicine, Medical Sciences Campus, University of Puerto Rico, invites applications for two tenuretrack positions at the rank of ASSISTANT/ASSO-CIATE PROFESSOR in (1) medical parasitology and (2) bacterial pathogenesis/bacterial physiology. The appointees will participate in teaching their respective disciplines to graduate, professional (medical and dental), and undergraduate students in the health sciences and establish an externally funded research program. Applicants must have a Ph.D. or equivalent degree and postdoctoral training. Respective research interests in medical parasitology or bacterial pathogenesis/bacterial physiology, ability to adapt and be productive in a different cultural setting, and evidence of publications in peer-reviewed journals are definite assets. Anticipated starting date: July 1, 2002. Research-related supporting programs and facilities of the Medical Sciences campus include RISE/SCORE (website: http:// mbrs.rcm.upr.edu), RCMI (website: http:// rcmi.rcm.upr.edu) and its core resources, RCMI Clinical Research Center, Flow Cytometry, Electron Microscopy, and Image Analysis; and the Caribbean Primate Research Center. Institutional incentives including salary supplementation are available for Investigators receiving external funding. Candidates should send curriculum vitae; a statement of research interests; a list of grant awards; copies of selected publications; and arrange three letters of recommendation to be sent by January 15, 2002, to: Wieslaw J. Kozek, Ph.D., Chair, Search Committee, Microbiology, MSC-UPR, P.O. Box 365067, San Juan, PR 00936-5067. Telephone: 787-759-8257; FAX: 787-758-4808; e-mail: wkozek@rcm.upr.edu.

The University of Puerto Rico is an Equal Opportunity/ Affirmative Action Employer. Women and minorities are strongly encouraged to apply.

MOLECULAR AND CELLULAR BIOLOGY

The Department of Biology at the University of Missouri-St. Louis invites applications for up to two tenure-track positions at the ASSISTANT or AS-SOCIATE PROFESSOR level beginning August 2002. Applicants must have a Ph.D., postdoctoral experience, and a strong record of research accomplishments. Outstanding candidates whose research focuses on any area of molecular biology, cellular biology, genomics, immunology, or virology will be considered. The successful candidate(s) will be expected to establish a strong, externally funded research program and participate in teaching at the undergraduate and graduate levels. Applicants should submit curriculum vitae, statements of research plans and teaching interests, and three letters of reference to: Shirley Bissen, Chair of Molecular Biology Search Committee, Department of Biology, University of Missouri-St. Louis, 8001 Natural Bridge Road, St. Louis, MO 63121-4499. Review of applications will begin in mid-December 2001. Visit our website: http://www. umsl.edu/~biology. The University of Missouri-St. Louis is an Affirmative Action/Equal Opportunity Employer committed to excellence through diversity.

ANIMAL ECOLOGY/MANAGEMENT

We seek to fill two tenure-track, nine-month positions at the ASSISTANT/ASSOCIATE PROFES-SOR level in animal ecology/management, one in community and ecosystem ecology/management and the other in animal population ecology/management. Applicants should have strong quantitative skills and training in statistical, spatial, and/or simulation modeling. To apply, send curriculum vitae; statements of research and teaching experience; names, addresses, e-mail addresses, and telephone numbers of three references; and pertinent reprints to: Fred Provenza, Search Committee, College of Natural Resources, Utah State University, Logan, UT 84322-5230. We will begin reviewing applications January 1, 2002, and continue until the position is filled. See Job Number 2-136 for full announcement. Affirmative Action/Equal Opportunity Employer. We encourage applications from women and minorities

George Mason University

DEAN

College of Nursing and Health Science George Mason University

George Mason University invites applications and nominations for the position of Dean of the College of Nursing and Health Science (CNHS). The Dean provides overall academic and administrative leadership for the College and serves on the Provost's Administrative Committee and the President's University Council.

The College offers Baccalaureate, Master's, and Doctoral programs in nursing and Baccalaureate and Master's programs in health science. It houses a Center in Health Policy, Research, and Ethics as well as a WHO Collaborating Centre for Nursing and Midwifery Development. In addition, the CNHS WHO Collaborating Centre serves as the secretariat for the global network of WHO Collaborating Centres for Nursing and Midwifery Development. This program has been ranked (U.S. News and World Report) in the top 50 for the past six years. CNHS has over 1,000 students currently enrolled in its programs.

Candidates must have a Master's degree in nursing with an earned Doctorate and a strong record as a teacher and scholar consistent with professional rank. Preference will be given to candidates with significant academic administrative experience and a record of facilitating external funding. The Search Committee will begin reviewing dossiers on November 15, 2001, but will continue to receive applications until the Dean is selected.

Located in Fairfax, Virginia, GMU is attended by over 26,000 students. It is within 15 miles of the nation's capital, close to Dulles and Reagan National Airports, and within easy reach of over 30 universities and junior colleges as well as several of the country's premiere performing arts and over 300 health care facilities. Fairfax boasts a robust economy with a large government employment sector complemented with over 7,000 information technology, software, and telecommunication companies in a 25-mile radius of the campus. Fairfax has some of the finest public schools in the country and over 30,000 acres of public parklands to provide a unique quality of life.

Candidate applications should be sent with a letter addressing qualifications and include curriculum vitae and the names, addresses, and telephone numbers of four references to:

> Dean Kingsley E. Haynes CNHS Dean Search School of Public Policy MSN 3C6 George Mason University 4400 University Drive Fairfax, VA 22030-4444 Telephone: 703-993-2280

Men and minority candidates are encouraged to apply. Affirmative Action/Equal Employment Opportunity.

COMPUTATIONAL BIOLOGY SUNY STONY BROOK

One new TENURE-TRACK or TENURED **POSITION** is anticipated in the growing computational biology group in the Department of Applied Mathematics and Statistics at SUNY Stony Brook for fall 2002. Area of specialization is open: bioinformatics, computational genomics, computational structural biology, mathematical biology, or a related field. For a tenured position, an established, externally funded research program is required. Applicants would be expected to participate in collaborations with researchers at Brookhaven National Laboratory, Cold Spring Harbor Laboratory, and the Stony Brook life science departments. Send curriculum vitae and research plan to: James Glimm, Department of Applied Mathematics and Statistics, Stony Brook, NY 11794-3600. E-mail: glimm@ams.sunysb. edu. Please ask three people to send references. Affirmative Action/Equal Opportunity Employer.



West Virginia University Robert C. Byrd Health Sciences Center

Mary Babb Randolph Cancer Center Post-doctoral Positions in Cancer Cell Biology

The Mary Babb Randolph Cancer Center seeks candidates for post-doctoral positions in the discipline of Cancer Cell Biology. Opportunities for post-doctoral training are available in the areas of proteomics, signal transduction, cytochrome P450 and DNA repair. Each of these projects focuses on different aspects of the role of signal transduction in cancer and are supported by core funding:

Aaron Timperman, PhD – Department of Chemistry. Elucidation of cancer markers through microfluidics and proteomics. Email: atimperm@wvu.edu

Quentin Li, PhD – Department of Microbiology/Immunology/Cell Biology. Cellular signals that regulate angiogenesis and cisplatin sensitivity/DNA repair activity in resistant ovarian cancer and other tumors. Email: qli@hsc.wvu.edu

Grazyna Szklarz, PhD – Department of Basic Pharmaceutical Sciences. Molecular modeling of cytochrome P450. Email: gszklarz@hsc.wvu.edu

Solveig Ericson, MD/PhD – Departments of Medicine and Microbiology/Immunology/Cell Biology. Signal transduction in neutrophils, regulation of cytokine production and cellular motility. Email: ericsons@rcbhsc.wvu.edu

Bing-Hua Jiang, PhD – Department of Microbiology/Immunology/Cell Biology. Mechanism of angiogenesis and tumorigenesis mediated by PI3 kinase/Akt/PTEN signaling. Email: bhjiang@hsc.wvu.edu

The Mary Babb Randolph Cancer Center serves as a focal point for West Virginia University's interdisciplinary studies on Cancer Cell Biology. Modern and dedicated laboratory space exists in the Robert C. Byrd Health Sciences Center and the School of Arts and Sciences, Department of Chemistry for these post-doctoral positions. The West Virginia University Robert C. Byrd Health Sciences Center is defined by 5 basic science departments with modern core facilities including transgenic mouse core, animal quarters, DNA core facility, Flow cytometry, Mass spectrometry/ Proteomics core as well as excellent equipment and modern laboratory space throughout the Health Sciences Center.

The city of Morgantown is located in northern West Virginia, approximately 80 miles south of Pittsburgh and 3 hours west of Baltimore/Washington D.C. Morgantown is beautifully located on the western slopes of the Appalachian Mountains and is listed among the best small towns in the USA, with affordable housing, excellent schools, very low crime and easy access to a variety of four season activities including several ski resorts, cross country skiing, white water rafting, hiking and biking trails and many activities geared to children.

Candidates must have a Ph.D. and/or M.D. degree. Applicants should send a curriculum vitae, letters from 3 references and a statement of research interests to Dr. Daniel Flynn or contact individual PI's listed above. Daniel C. Flynn, PhD, Associate Director for Basic Research, Mary Babb Randolph Cancer Center, 2822 MBRCC, West Virginia University, Morgantown, WV 26506-9300. Email: dflynn@hsc.wvu.edu

Review of applications will continue until the positions are filled.

West Virginia University is an Equal Opportunity Employer.

THE UNIVERSITY of EDINBURGH



THE WELLCOME TRUST – CARDIOVASCULAR RESEARCH INITIATIVE (CVRI)

INTERMEDIATE RESEARCH FELLOWSHIPS

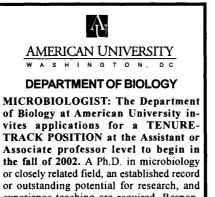
Through a substantial award from The Wellcome Trust's Cardiovascular Research Initiative to The University of Edinburgh, one of the UK's leading institutions for biomedical research, opportunities now exist for outstanding basic and clinical scientists to develop their career in the molecular and cell biological aspects of research into disease of the cardiovascular system. Based in 5A-rated RAE departments within the Faculty of Medicine, the Edinburgh CVRI is a dynamic and closely integrated grouping of leading research laboratories bringing international-level strengths in basic science and clinical investigation to focus on the causes of cardiovascular disease.

Key themes of the CVRI include: Cardiovascular Growth and Development, Cardiovascular Programming, Endothelial Function, and Vascular Injury and Repair in groups headed by Professors Keith Fox (Vascular Injury), Christopher Haslett (Inflammation Research), John Mullins (Molecular Physiology), Jonathan Seckl and Brian Walker (Programming and Endocrinology), and David Webb (Endothelial Cell Biology and Molecular Cardiology). Candidates should have significant research experience from the date of their doctoral degree and are likely to have published papers of their findings in leading journals, as well as having demonstrated an ability to pursue independent research.

If you are interested in developing your career in cardiovascular research please contact Professor John Mullins with a letter of application, CV and details of three referees, together with an outline of your proposed area of research by 9 November 2001.

Professor John J Mullins, Programme Director, Wellcome Trust Cardiovascular Research Initiative, The University of Edinburgh, Wilkie Building, Medical School, Teviot Place, Edinburgh EH8 9AG. Tel: 0131 651 1597. E-mail: cvri@ed.ac.uk. www.cvri.med.ed.ac.uk.

Committed to Equality of Opportunity



or closely related field, an established record or outstanding potential for research, and experience teaching are required. Responsibilities include teaching introductory, general education, and advanced courses for majors and nonmajors, developing a strong, externally funded research program, student advising, and university service.

Submit a letter of application, personal vitae, and statement of teaching philosophy and have three letters of reference sent directly from the referrers to: Dr. Cathy Schaeff, Chair, Department of Biology, American University, 4400 Massachusetts Avenue, Washington, D.C. 20016-8007. Review of applications will begin on November 15, 2001 and continue until the position is filled.

American University is an Affirmative Action/Equal Opportunity Employer, committed to a diverse faculty, staff, and student body. Women and minority candidates are strongly encouraged to apply.



POSTDOCTORAL POSITIONS

for the Program in Molecular Neurobiology. Candidates should have a strong neuroscience background and evidence of familiarity with molecular biology techniques. Prospective candidates should send resumes with three letters of reference to:

> Judy C. Hollkamp Project Coordinator Department of Anatomical Sciences and Neurobiology University of Louisville Louisville, KY 40292.

ph: 502-852-4880; fax: 502-852-1475 email: jhollkamp@louisville.edu website: http:// www.neurosci.louisville.edu

Affirmative Action/Equal Opportunity Employer.

NORTH CAROLINA STATE UNIVERSITY DEPARTMENT OF PHYSICS Experimental Nanoscale/Biological Physics

The Department of Physics at NC State University has hired six new faculty members over the past two years and continues to seek highly qualified applicants in all areas for tenure-track and tenured positions. Candidates in nanoscale science and in biological physics are especially encouraged to apply at this time. Successful applicants will have strong commitments to excellence in teaching and will be expected to establish a vigorous research program. The Department has active and internationally recognized groups in astrophysics; computational physics; condensed matter, polymer, surface, and materials physics; nuclear and particle physics; and physics education research. We plan to hire primarily at the ASSISTANT PRO-FESSOR level but will also consider particularly qualified senior applicants. NC State University is one of the vertices of the Research Triangle Park, home to many industrial research campuses and federal and state research organizations. Candidates should send curriculum vitae, a brief summary of research and teaching goals, and a list of at least three references to: Physics Personnel Committee (Chair, Dale Sayers), Department of Physics, Box 8202, North Carolina State University, Raleigh, NC 27695-8202. Minimum qualifications include an earned Ph.D. degree in physics or a physics-related area. To receive full consideration, applications for the fall 2002 academic year should be received by December 31, 2001. Review of applications will begin immediately but no final decision and will be made prior to December 31, 2001. NC State University is an Equal Opportunity/Affirmative Action Employer. Americans With Disabilities Act Accommodations: Rebecca Savage; Telephone: 919-515-2522.

DIRECTOR, CENTER FOR ENVIRONMENTAL PROGRAMS AND ASSOCIATE PROFESSOR

The College of Arts and Sciences at Bowling Green State University invites applications for the position of Director for the Center of Environmental Programs, an interdisciplinary unit offering two undergraduate degree programs. The successful candidate will also hold the rank of Associate Professor (tenure track). Candidates should have a Ph.D. with a strong research and teaching record in some area of environmental science, environmental policy, or environmental education. Send a letter of application with curriculum vitae, research and teaching statements, a statement on administrative experience and philosophy, three original and current reference letters, and representative reprints to: Dr. Edmund Danziger, Jr., Chair, Environmental Director Search Committee, College of Arts and Sciences, 205 Administration Building, Bowling Green State University, Bowling Green, OH 43403. Applications must be postmarked by December 15, 2001. For additional information, visit: website: http://www.bgsu.edu/ departments/envp. Affirmative Action/Equal Employment Opportunity Employer.

HEMATOLOGIST

Faculty position: The Division of Hematology is seeking a Physician/Scientist for a full-time academic position at the **ASSISTANT** or **ASSOCIATE PRO-FESSOR** level. Primary responsibilities will be in research (75%) and patient care/teaching. Preference will be given to candidates with independent funding ose research interests are broadly related to genet-

cular biology, hemostasis/thrombosis, and hetopoiesis. Must be Board certified in internal med-

cine and Board eligible/certified in hematology and/ or oncology. Considerable start-up funds and laboratory space are available to support this expanded effort. Please send letter of interest and curnculum vitae to: Dr. Wadie F. Bahou, Chief of Hematology, HSC, T15/040, SUNY Stony Brook, Stony Brook, NY 11794-8151. SUNY Stony Brook is an Affirmative Action/Equal Opportunity Employer. POSITIONS OPEN



MOLECULAR AND CELL BIOLOGY

The Department of Molecular and Cell Biology of The University of Texas at Dallas invites applications for two new faculty positions (rank open), which will begin in 2002. Candidates with expertise in proteomics, functional genomics, bioinformatics/computational biology, structural biology, and transgenics as applied to important questions in cell biology, developmental biology, neurobiology, and molecular pathogenesis are encouraged to apply. The successful applicant also has the opportunity for membership in our Institutes of Sickle Cell Disease Research, Applied Biology, and Nanotechnology. You will be joining a well-funded, research-intensive faculty, which currently has 16 full-time primary appointments. Your teaching responsibilities will be primarily advanced graduate courses in your area of expertise. Our location is the high-tech-rich corridor of North Dallas, Texas. Please forward your curriculum vitae, short description of future research plans and teaching interests, and have letters of reference (three for ASSIST-ANT PROFESSOR applicants and five for ASSOCI-ATE PROFESSOR and PROFESSOR applicants) sent to: Academic Search Number 2052, The University of Texas at Dallas, P.O. Box 830688, M/S AD 23, Richardson, TX 75083-0688. Review of application material will commence on December 3, 2001, and continue until the positions are filled.

The University of Texas at Dallas is an Affinnative Action/ Equal Opportunity Employer and strongly encourages applications from candidates who would enhance the diversity of the University's faculty. Indication of sex and ethnicity for Affirmative Action statistical purposes is requested as part of the application but not required.

The Department of Biological Sciences, University at Buffalo, The State University of New York, invites applications for a tenure-track position at the level of ASSISTANT PROFESSOR starting in September 2002. We are seeking applications from individuals with expertise in the broad areas of developmental biology and/or gene regulation in eukarvotic organisms. Faculty members in the Department are involved in a wide variety of research programs spanning the breadth of the biological sciences. Outstanding research facilities and a competitive setup package will be provided to the successful candidate. The successful candidate will be expected to develop an active, externally funded research program and to teach in his/her area of expertise. Candidates should have a Ph.D. and at least two years of postdoctoral experience.

To apply, please submit curriculum vitae, a description of current and future research interests, up to three recent or in-press publications, and three reference letters sent to: Faculty Search Committee, Department of Biological Sciences, 109 Cooke Hall, SUNY at Buffalo, Buffalo, NY 14260. Application review will begin January 1, 2002, and continue until the position is filled. Information about the Department of Biological Sciences and the University can be viewed at website: http://www.buffalo.biology. edu. The University at Buffalo is an Equal Opportunity Employer/Recruiter.

The University of Wisconsin-Madison Biomedical Engineering Department invites applications for a tenured or tenure-track position beginning January 2002. A Ph.D. degree in BME or other related area required. The University of Wisconsin has positions in the area of cellular scale, micro/nanoscale phenomena, and bioMEMs. Applications will be accepted until the positions are filled but for full consideration, applications should be received by December 1, 2001. Submit applications (résumé and three references) to: Robert G. Radwin, Chair, Biomedical Engineering Department, UW-Madison, 1410 Engineering Drive, Madison, WI 53706-1608. UW-Madison *is an* Equal Opportunity Employer functioning under an Affirmative Action plan. Reference PVL 40899.

POSITIONS OPEN

The Department of Psychology, University of Massachusetts Amherst, invites applications for a tenuretrack position in neural plasticity and development beginning fall 2002. The position will most likely be filled at the ASSISTANT PROFESSOR level but candidates at the ASSOCIATE PROFESSOR level will be considered. Applicants should be engaged in research aimed at learning how structure and function of neural connections and synapses change during development or in response to external or internal stimuli in vivo or in vitro. We are especially interested in candidates who work at cellular and molecular levels of analysis and can interface with existing faculty in strong graduate programs in neuroscience and behavior (with emphasis on neural plasticity and development, neuroendocrinology, and animal behavior) and cognitive psychology (with emphasis on attention, memory, language processing, and cognitive neuroscience). Both programs currently have training grants and solid extramural research support. Salary is dependent on experience and qualifications. Applicants should send curriculum vitae, a statement of research and teaching interests, reprints of recent publications, and at least three letters of recommendation to: Neural Plasticity and Development Search Committee, Department of Psychology, University of Massachusetts, Amherst, MA 01003-7710. We will begin reviewing applications in November 2001 and will continue until the position is filled. Hiring is contingent upon the availability of funds. The University of Massachusetts is an Affirmative Action/Equal Opportunity Employer. Women and members of minority groups are highly encouraged to apply.

DEPARTMENT OF BIOLOGICAL SCIENCES

The University of Texas at El Paso invites applica tions for a tenure-track position for an ASSISTANT PROFESSOR/PHYSIOLOGIST. Researchers focusing on endocrine or metabolic mechanisms are particularly invited. Candidates should have a Ph.D., postdoctoral experience, and a record of research productivity that demonstrates the potential to establish an externally funded research program and the potential for directing Doctoral students. Salary and startup funds are competitive. The Department has excellent molecular biology, tissue culture, and electron microscope facilities. An active research program and teaching of physiology at the undergraduate and graduate level are expected. Send a letter of application, current curriculum vitae, a summary of research interests, copies of two publications, your teaching philosophy, and names of three references to: Dr. Joanne T. Ellzey, Chair, Search Committee, Department of Biological Sciences, UTEP, El Paso, **TX 79968-0519**. Applications will be reviewed be-ginning December 1, 2001, and review will continue until the position is filled. The University does not discriminate on the basis of race, color, national origin, sex, religion, age, disability, or sexual orientation in Employment or the provision of services.

THE UNIVERSITY OF TEXAS AT EL PASO

The Department of Biological Sciences announces a tenure-track position for an ASSISTANT PRO-FESSOR in viral pathogenesis. Candidates should have a Ph.D., postdoctoral experience, and a record of research productivity that demonstrates the potential to establish an externally funded research program and the potential for directing Doctoral students. Salary and start-up funds are competitive. The Department has excellent molecular biology, tissue culture, and EM/conofocal microscope research facilities. Applicants should have a strong commitment to teaching at both the undergraduate and graduate levels. Send current curriculum vitae, a summary of research interests, copies of selected publications, and names of three references to: Dr. Siddhartha Das, Search Committee, Department of Biological Sciences, UTEP, El Paso, TX 79968-0519. Applications will be reviewed beginning December 1, 2001, will continue until the position is filled. The University does not discriminate on the basis of race, color, national origin, sex, religion, age, disability, or sexual orientation in Employment or the provision of services.

THE NATIONAL ACADEMIES

The National Research Council announces Postdoctoral Research Opportunities in the NASA Astrobiology Institute

Postdoctoral research awards will be offered in the field of astrobiology at the NASA Astrobiology Institute. NASA has formed this new Institute to study the origin, distribution, evolution, and future of life on Earth and in the universe. Awards will be offered for multidisciplinary research in biology, genetics, chemistry, geology, planetary and space science, astronomy, paleontology, and other astrobiology-related areas. The awards will be for one year, possibly renewable, through the following lead institutions or their collaborators:

NASA Ames Research Center NASA Johnson Space Center NASA Jet Propulsion Laboratory Arizona State University University of California, Los Angeles University of Colorado, Boulder Harvard University Pennsylvania State University Carnegie Institution of Washington Marine Biological Laboratory Scripps Research Institute University of Washington Michigan State University University of Rhode Island

 Stipend begins at \$45,000 per year; Annual deadline is January 15
 Information & application materials at: www.national-academies.org/rap, or contact:

Dr. Robert Manka, Associate Director, or Ms. Sally Lytch, Program Coordinator Associateship Programs (TJ 2114/NAI) NATIONAL RESEARCH COUNCIL 2101 Constitution Ave NW Washington, DC 20418 E-mail: rap@nas.edu Internet: www.national-academies.org/rap Tel: (202) 334-2760

Dr. Edward Goolish, Science Projects Manager NASA Astrobiology Institute, MS 240-1 NASA Ames Research Center Moffett Field, CA 94035-1000 E-mail: egoolish@mail.arc.nasa.gov Intemet: http://nai.arc.nasa.gov Tel: (650) 604-1961

Qualified applicants will be reviewed without regard to race, religion, color, age, sex or national origin. The University of Sheffield



DEPARTMENT OF CHEMISTRY

PROFESSOR OF NANOSCALE ANALYTICAL SCIENCE

Following a successful bid to EPSRC/RSC the University is seeking to make appointments to drive forward research in nanoscale analytical science. Central to this aim is the establishment, in the Department of Chemistry, of a new research group with a strong inter-disciplinary/industrial dimension which will address measurement opportunities in the emerging fields of nanoscience and technology.

For the Chair appointment candidates of international standing should have a background in the physical/analytical sciences and a strong commitment to developing nanoscale instrumentation and characterisation tools for strategic and high purity materials for application in semiconductor, opto-electronic and nanotechnology devices. The post carries a competitive salary package, an EPSRC start-up grant (£100K), three fully funded PhD studentships and technical support.Informal enquiries can be made to Professor AJ Ryan, 0114 222 9409 a.ryan@shef.ac.uk

Closing date for applications: 30 November 2001 (Ref: R2457)

An Equal Opportunity Employer

For details of this post, Email: jobs@sheffield.ac.uk or Tel: 0114 222 1631 (24hr). Please quote the post reference in all correspondence.

Vacancy Web Site: http://www.shef.ac.uk/jobs/

FACULTY POSITIONS Cardiovascular Research

The University of Medicine and Dentistry of New Jersey-New Jersey Medical School is seeking applicants for faculty (Assistant Professor) and Postdoctoral Fellow positions in the Cardiovascular Research Institute.

Applicants should have a Ph.D., M.D. or D.V.M. and have demonstrated experience in Myocyte Mechanisms and Calcium Regulation.

Send resume including the names of at least three references and a description of research interests and indicate whether interested in faculty or postdoctoral position, to:

> Stephen F. Vatner, M.D., Director Cardiovascular Research Institute UMDNJ, New Jersey Medical School MSB-1-576 185 South Orange Ave. Newark, NJ 07103

For more information visit our website at: http://www.umdnj.edu/hrweb/



UMDNJ is an Affirmative Action/ Equal Opportunity Employer M/F/D/V.



Bodega Marine Laboratory is seeking an assistant or associate (Master's/Ph.D. preferred) director to assist the Director in facilitating and implementing the research, education and public

service missions of the Laboratory. An advanced degree in marine science is preferred. The successful candidate is expected to have extensive experience in marine laboratory operations, including capital planning, contract review/interpretation, physical plant operations, environmental regulation/permitting, budget management and marine operations. Demonstrated success is required in obtaining extramural support from governmental and private sources for marine science facilities and education/training. Demonstrated success in large public education programs is desirable. Bodega Marine Laboratory is an Organized Research Unit of the University of California, Davis, located in Bodega Bay, Sonoma County, California, about 100 miles from the Davis campus. BML and its surrounding 362acre Reserve provide research and instructional facilities for resident, campus-based and visiting faculty, researchers and students. Primary research emphasis is in population biology/ecology, organismal and cell biology and aquaculture and fisheries.

Please see http://www-bml.ucdavis.edu/ bmljobs.html for the full position description and application process. Position is open until filled; applications will be reviewed beginning December 1, 2001.

UC Davis is an EEO/AA Employer.

ASSISTANT PROFESSOR, BIOLOGY: The Division of Natural Science at Viterbo University invites applications for a tenure-track Assistant Professor in biology with an emphasis in ecology starting August 2002. Expertise in application of modern methods to fundamental and applied problems in ecology or conservation biology. Candidates must have a Ph.D. and demonstrate a strong commitment to undergraduate teaching in a liberal arts setting. Preference will be given to candidates interested in coordinating an interdisciplinary environmental studies minor. Course responsibilities include ecology and evolution in the biology major sequence, field courses in specialty area, and biostatistics and/or courses in the environmental studies minor. The successful candidate will have the ability to maintain a research program that involves undergraduate students. Viterbo University is a Catholic, Franciscan, ecumenical liberal arts institution with an undergraduate enrollment of 1,700 and is located in La Crosse, Wisconsin, in the scenic upper Mississippi River valley. Construction of a new ethics, science, and technology center housing the sciences begins in March 2002. Submit application letter, statement of teaching philosophy and research interests, curriculum vitae, graduate and undergraduate transcripts, and three letters of reference to: Dr. Michael Collins, Chair, Natural Science IV: Dr. Michael Collins, Chair, Natural Science Division, Viterbo Uni-versity, 815 South Ninth Street, La Crosse, WI 54601. Website: http://www.viterbo.edu/biol-ory Review barries December 10, 2000 ogy. Review begins December 10, 2001. Applica-tions accepted until position is filled. *Applications by* women and members of other underrepresented groups are encouraged.

Northern Illinois University anticipates a tenuretrack position for fall 2002. **ASSISTANT PROFES-SOR** in molecular microbiology. Research areas can include microbial ecology, bioremediation, biofilms, nonculturable microbes, cell signaling, or functional genomics. A Ph.D. in biological sciences and postdoctoral research experience are required. The successful candidate is expected to develop a vigorous, externally funded research program; direct graduate (M.S. and Ph.D.) students; and teach a course in her/his specialty and contribute to introductory courses.

Send a letter of interest, curriculum vitae, brief statements of research and teaching goals, and three current letters of reference to: Dr. Michael Parrish, Chair, Department of Biological Sciences, Northern Illinois University, DeKalb, IL 60115-2861. Website: http://www.bios.niu.edu; Telephone: 815-753-1753; FAX: 815-753-0461; e-mail: biosjobs@niu.edu. The position will remain open until filled but we will begin reviewing completed applications on December 1, 2001. Northern Illinois University is an Affirmative Action/Equal Employment Opportanity Institution.

Biological sciences: ASSISTANT PROFESSOR (full-time) beginning August 1, 2002. Molecular Geneticist: Ph.D. required and postdoctoral research experience desired. Primary teaching responsibilities involve undergraduate courses in introductory genetics and molecular genetics, a graduate course in environmental genetics, and development of advanced courses in specialty of interest. Commitment to teaching excellence, responsiveness to student needs, and effective communication skills essential. Scholarly activities and a research program that involves undergraduate and graduate students expected. Pursuit of extramural funding for research essential. Advising students and participation in departmental matters required. Preference given to candidates with demonstrated excellence in college or university teaching. Send curriculum vitae, transcripts, statement of interest and goals in teaching and research, and three reference letters to: Dr. Charles H. Nelson, Head, Department of Biological and Environmental Sci ences, 615 McCallie Avenue, The University of Tennessee at Chattanooga, Chattanooga, TN 37403. Screening of credentials will begin December 1, 2001, and will continue until the position is filled. UTC is an Equal Employment Opportunity/Affirmative Action/Title V1/Title IX/Section 504/Americans With Disabilities Act/Age Discrimination in Employment Act Institution.

POSITIONS OPEN

TENURE-TRACK FACULTY POSITION DEPARTMENT OF PHARMACOLOGY AND EXPERIMENTAL THERAPEUTICS Louisiana State University Health Science Center

New Orleans

The Department of Pharmacology and Experimental Therapeutics at the Louisiana State University Health Sciences Center in New Orleans (website: http://www.medschool.lsuhsc.edu/phar) seeks applicants for the second phase of recruitment to fill several tenure-track positions (open rank). Individuals with expertise and interest in integrated in vitro and in vivo approaches to pharmacology are encouraged. Preference will be given to those applicants whose research complements the existing areas of cardiovascular biology and neuroscience. Other areas of strength include drug and alcohol abuse and cancer/toxicology. The successful candidate will have a demonstrated ability or potential to establish an externally funded research program, to train graduate students/Postdoctoral Fellows, and participate in the teaching activities of the Department. Qualified individuals should send their curriculum vitae, reprints of three publications, a statement of current interests and future goals that emphasizes how their interests might complement the existing strengths of the Department, and three letters of reference. Please send these by mail to: Stephen M. Lanier, Ph.D., Head of Pharmacology, 1901 Perdido Street, New Or-leans, LA 70112-1328. Send electronically to Thelma Evans; e-mail: pharmacology@lsuhsc.edu. The deadline for receipt of applications is October 31, 2001. LSUHSC is an Equal Opportunity Employer/Affirmative Action Employer.

EVOLUTIONARY, POPULATION, OR DEVELOPMENTAL BIOLOGIST

The Department of Biological Sciences at the University of Southern Maine invites applications for an Evolutionary, Population, or Developmental Biologist who uses molecular techniques. This is a tenuretrack, academic-year appointment starting September 2002 contingent upon funding. Rank is open. This will be a joint appointment with the Biosciences Research Institute of Southern Maine and the Department of Biological Sciences. The successful candidate is expected to teach courses at the undergraduate and graduate (Master's) level and maintain an active, extramurally funded research program. USM is expanding research with targeted State funding that includes a new science research wing. Letters of application stating teaching and research interests, curriculum vitae, and contact information for three references should be sent to: David Champlin, Chair, Search Committee, Department of Biological Sciences, RE: 101, University of Southern Maine, P.O. Box 9300, Portland, ME 04104-9300. Review of applications will begin 30 November 2001. The University of Southern Maine seeks applicants who are committed to teaching diverse populations in an open and accepting classroom.

AQUATIC VERTEBRATE TOXICOLOGIST

A tenure-track position (ASSISTANT or ASSO-CIATE PROFESSOR) is available in the Department of Biology, University of Saskatchewan (website: http://www.usask.ca/biology). The appointee is expected to develop a strong research program on the effect of environmental contaminants at the organism or suborganism level and work within biology and the interdisciplinary toxicology program. An emphasis on reproductive or physiological effects in freshwater vertebrates and experience with animals in their natural environments are desirable. A Ph.D. and postdoctoral or equivalent experience are required; teaching experience is an asset. Send curriculum vitae; names of three references; and statements of research and teaching interests to: Dr. V. K. Sawhney, Head, Department of Biology, University of Saskatchewan, 112 Science Place, Saskatoon, SK S7N5E2 Canada by November 30, 2001. Priority will be given to Canadian applicants but all qualified individuals are invited to apply. The University of Saskatchewan is committed to Employment Equity.

POSITIONS OPEN

TENURE-TRACK FACULTY POSITION Functional Genomics and Development

The Department of Molecular Genetics and Biochemistry, University of Pittsburgh School of Medicine, has a tenure-track **ASSISTANT PROFESSOR** position available for research in the area of functional genomics, development, cellular differentiation, or stem cell biology. Applicants with substantial experience and funding will also be considered for appointment at the **ASSOCIATE PROFESSOR** level. Individuals whose research programs are focused on the application of functional genomics to the analysis of mammalian development or disease are particularly encouraged to apply. The University of Pittsburgh School of Medicine is a top 10 NIH-funded medical school located in one of America's most livable cities.

Requirements include a Ph.D. or M.D. and relevant postdoctoral training. Candidates will be expected to develop an independent, externally funded research program and to excel in teaching graduate and medical students.

Send curriculum vitae, brief statement of research interests, and three letters of reference for Position Number 2993 to:

Dr. Joseph C. Glorioso, Chairman Department of Molecular Genetics and Biochemistry

University of Pittsburgh School of Medicine E1240 Biomedical Science Tower Pittsburgh, PA 15261

Preference will be given to candidates whose completed applications are received by January 31, 2001. The University of Pittsburgh is an Affirmative Action/Equal Opportunity Employer.

GROSS ANATOMIST University of Missouri–Kansas City School of Medicine

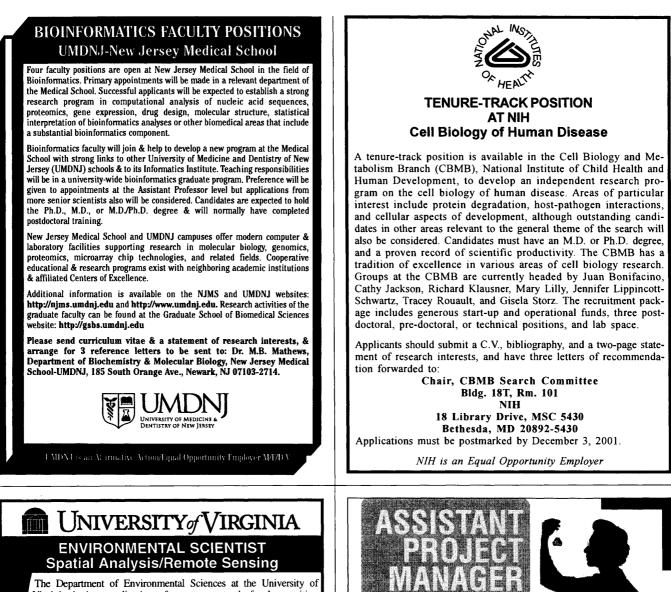
Gross Anatomist with Ph.D. or M.D. for a nontenure-track FACULTY POSITION at an academic rank consistent with the applicant's qualifications in a growing multidisciplinary department that rewards excellence in teaching. Qualified individuals may also have additional experience in neuroanatomy, histology, or physiology but the successful candidate will have demonstrated primary experience as a Gross Anatomist. Responsibilities shared with other Anatomists include course coordination and contributions to lecture and laboratory-based anatomy courses for medical and dental students. Although research is not emphasized, opportunities exist and the research interests of Anatomists in the Department include physical anthropology, vertebrate paleontology, and craniodental development and evolution. Salary is contingent upon qualifications. Applications will be accepted until the position is filled.

Please submit curriculum vitae with the names, telephone numbers, and postal and e-mail addresses of three individuals who can testify to your teaching skills to:

Ted Beringer, Ph.D. Chairman, Gross Anatomist Search Committee UMKC Medical School 2411 Holmes Street Kansas City, MO 64108 E-mail: beringert@umkc.edu

UMKC is an Affirmative Action/Equal Opportunity Institution.

POSTDOCTORAL FELLOW wanted for twoto-three-year grant-funded position. Research will be focused on the role of nitric oxide and eicosanoids in lupus nephritis. Applicants must be familiar with basic molecular and protein techniques, be relatively sclfsufficient, be competent in handling and administering medications to rodents, and have interest in mass spectroscopy and GC mass spectroscopy techniques. Send curriculum vitae and references to: Jim Oates, M.D., Department of Medicine, Medical University of South Carolina, 96 Jonathan Lucas Street, P.O. Box 250623, Charleston, SC 29425. E-mail: oatesjc@musc.edu.



Virginia invites applications for a tenure-track faculty position addressing environmental science topics involving spatial data analysis and remote sensing. The Department, which offers BA, MS and PhD degrees, is an interdisciplinary community of scientists representing hydrology, geosciences, ecology and atmospheric sciences. Successful candidates are expected to build a vigorous research program in at least one of the departmental disciplines. The position is for an Assistant Professor but more advanced applicants will be considered.

It is anticipated that the successful candidate will develop an undergraduate teaching program in spatial data analysis with Geographic Information Systems (GIS programs such as ARCINFO or ERDAS/IMAGINE) and a graduate teaching program on fundamental topics in remote sensing, image processing and other related areas. In conjunction with these teaching activities, the new faculty member will assist in coordinating university-wide activities in spatial data analysis with GIS. These activities will provide opportunity for extensive interdisciplinary collaboration across the university.

Send statements of research and teaching interests, curriculum vitae, and the names and addresses of three references to:

Bruce P. Hayden, Professor and Chair University of Virginia **Department of Environmental Sciences** 291 McCormick Road, PO Box 400123 Charlottesville, VA 22904-4123

Evaluation of applications will begin on 15 November 2001. All applications must be received by 4 January 2002. We especially encourage applications from under-represented groups. For additional information, see the department web site at www.evsc.virginia.edu.

> The University of Virginia is an equal opportunity/ affirmative action employer.

Lindsley F. Kimball Research Institute, a division of New York Blood Center, one of the world's leading centers for basic and applied research in hematology, and transfusion medicine, currently



683616

has an excellent opportunity for an Assistant Project Manager in our Virology Lab.

You will create an ongoing inventory of plasma units for the panel and Dr. Alfred Prince, arrange for collection of additional plasma units. Arrange serologic and PCR testing of all members of the panel, incorporating results in a database. Ship units to aliguoting facility, keep database of status of all units and results. Identify kit manufacturers, and to arrange for kit evaluations to be carried out at PEI. Maintain database on kit evaluation and prices on ICBS website.

To qualify, you must have a Bachelor's degree and some laboratory experience, and knowledge of database operations. Position requires PC proficiency, including Word, Excel, Access and PowerPoint; sound knowledge of data entry. Strong organizational and communications skills. Excellent command of English language.

We offer a competitive salary and a comprehensive benefits package. For immediate consideration, please Email your resume with salary requirements to: Alfred_Prince@nybc.org, Fax: (212) 570-3180, Phone: (212) 570-3279. EOE M/F/D/V.



NEUROBIOLOGIST

The Department of Zoology at the University of Washington seeks applications for a tenure-track faculty position. The appointment will be made at the ASSISTANT PROFESSOR level. Although applicants in any area of neurobiology will be considered, those using physiological or molecular approaches to study the neural basis of behavior are especially encouraged. Successful candidates will be expected to contribute to undergraduate and graduate teaching and to establish an externally funded research program. Candidates should have a Ph.D. and at least one year of postdoctoral experience by start of appointment. The appointment is planned for September 2002. Send curriculum vitae, descriptions of research and teaching interests, and three letters of recommendation to: Chair, Neurobiology Search Committee, Department of Zoology, University of Wash-ington, Seattle, WA 98195-1800. Priority will be given to applications received before December 15, 2001. The University of Washington is building a culturally diverse faculty and strongly encourages applications from women and minority candidates. The University of Washington is an Equal Opportunity/Affirmative Action Employer.

FACULTY POSITIONS in bioinformatics and functional genomics. Tenure-track positions in the areas of bioinformatics and functional genomics are offered as part of a universitywide initiative in genomics. Candidates with research programs in genetics, developmental biology, or environmental biology are of special interest, although other research areas will be considered. Start-up packages include competitive salaries, generous equipment/supply budgets, new laboratory and computational facilities, and an outstanding collegial environment. Successful applicants are expected to establish nationally competitive research programs and participate in undergraduate and graduate instruction. Applicants should submit current curriculum vitae, a statement of current and future research interests, and arrange for three letters of recommendation to be sent to: Functional Genomics Search Committee, Dr. Brian Rymond, T.H. Morgan School of Biological Sciences, University of Kentucky, Lexington, KY 40506-0225. FAX: 859-257-1717; website: http://biology.uky. edu/. Review of applications will begin on November 10, 2001. The University of Kentucky is an Equal Opportunity Employer.

The Department of Entomology invites applications for a full-time, 12-month tenure-track faculty position (ASSISTANT PROFESSOR; 80% research, 20% instruction). Applicants should employ modern techniques to address fundamental issues of the genetic structure and evolution of insect populations and interactions of insects with other organisms. Ph.D. in biological science required; postdoctoral experience desirable. See website: http:// www.entomology.wisc.edu/. Send current curriculum vitae, undergraduate and graduate transcripts, statement of professional research and teaching interests, and three letters of recommendation to: Ms. Carol Scheehle, Departmental Administrator, 237 Russell Laboratories, 1630 Linden Drive, Madison, WI 53706. Deadline: December 31, 2001, or until suitable candidate is found.

The University of Wisconsin, an Equal Opportunity Employer, encourages women and minorities to apply. POSITIONS OPEN

TENURE-TRACK FACULTY POSITION

The University of Michigan School of Public Health Department of Epidemiology is recruiting for a tenure-track position at the **ASSISTANT, ASSO-CIATE** or **FULL PROFESSOR** level. The Department of Epidemiology has an exciting, rapidly growing research program in infectious diseases and international health and has a long history of integrating laboratory-based research with epidemiologic studies. The Department offers Master's and Doctoral training in epidemiology. We are seeking applicants with laboratory or clinical research programs in infectious diseases and teaching experience. We are particularly interested in candidates with research programs in HIV, virology, host susceptibility-pathogen interactions, vaccinology, parasitology, or antibiotic resistance but qualified candidates with other infectious disease research interests will be considered.

Review of candidates will begin December 1, 2001. Applications will be accepted until the position is filled. To apply, send curriculum vitae and three letters of reference to:

Betsy Foxman, Ph.D. Chair, Search Committee Professor of Epidemiology and Director Center for Molecular and Clinical Epidemiology of Infectious Diseases University of Michigan School of Public Health 109 Observatory Street Ann Arbor, MI 48109-2029

The University of Michigan is an Equal Opportunity/ Affirmative Action Employer.

ASSOCIATE/FULL PROFESSOR POSITION TOXICOLOGY OR CARCINOGENESIS Washington State University

The Department of Pharmaceutical Sciences has an opening available for a tenure-track/tenured position at the Associate or Full Professor level to begin July 1. 2002. Candidates must have a Ph.D. in a biomedical discipline or M.D., outstanding research and teaching credentials, and the ability to communicate effectively. Candidates must also have a nationally or internationally recognized independent research program with a history of extramural funding. Preference will be given to established Investigators with a strong record of scientific accomplishment and external research funding in toxicology or carcinogenesis. Screening of applicants will begin January 22, 2002, and continue until the position is filled. Send letter of application indicating the appropriate rank for your application, curriculum vitae, statements of research interests and teaching philosophy, and arrange for three letters of reference to be sent to: Margaret E. Black, Ph.D., Chair, Search Committee, Department of Pharmaceutical Sciences, College of Pharmacy, P.O. Box 646534, Washington State University, Pullman, WA 99164-6534. E-mail: blackm@mail.wsu.edu for additional information. WSU is an Equal Opportunity/Affirmative Action Educator and Employer.

The Department of Ecology and Evolution at Stony Brook University/SUNY invites applications for a position in evolutionary biology. All fields of evolutionary biology will be considered but applications will be especially welcome from individuals who work in evolutionary theory, genome evolution, or phylogenetic approaches to evolutionary questions. The level is open, although hiring at the ASSIST-ANT PROFESSOR level is likely pending budgetary approval. Applications should be received by December 1, 2001, and should include curriculum vitae and statements of research and teaching interests. Applicants for an Assistant Professorship should have three people send letters to: Evolution Search Committee, Department of Ecology and Evolution, Stony Brook University/SUNY, Stony Brook, NY 11794-5245. More senior applicants should send the names and addresses of three people who can serve as references. Affirmative Action/Equal Opportunity Employer.

POSITIONS OPEN

EAST TENNESSEE STATE UNIVERSITY Department of Biochemistry and Molecular Biology College of Medicine Johnson City, Tennessee RESEARCH ASSISTANT PROFESSOR: The

successful candidate must have at least three years of postdoctoral experience. The candidate will report to the Chairman of the Biochemistry and Molecular Biology Department. This is a three-year, annually renewable appointment. The appointment will be mentored with the long-term goal of achieving a scientifically independent program for the candidate with possibility for tenure. The areas of research of interest are the role of lipid metabolism (particularly related to regulation of gene expression) in atherosclerosis and the posttranslational modification of proteins with lipids. However, candidates with backgrounds in any area of contemporary biochemistry and molecular biology are encouraged to apply. The starting salary is \$48,000, per year plus full benefits and the position(s) will remain open until filled. The candidate must already have visa status appropriate for working in the United States. Send curriculum vitae and at least two letters of recommendation to: Michael Sinensky, Ph.D., Professor and Chair, Biochemistry and Molecular Biology, J. H. Quillen College of Medicine, East Tennessee State University, Box 70581, Johnson City, TN 37614-1708. Affirmative Action/Equal Opportunity Employer.

MICROBIOLOGY FACULTY POSITION Stanford University

Stanford University Department of Biological Sciences invites applications for the position of **ASSIST**-**ANT PROFESSOR** in the area of microbiology. We encourage applicants with research interests in molecular, cellular, and developmental microbiology and in microbial genetics, genomics, physiology, and biochemistry. Applicants are expected to develop a vigorous research program and to participate in both undergraduate and graduate education.

Applicants should send a letter of application including e-mail address, curriculum vitae, bibliography, names and e-mail addresses of three references, and statements of research and teaching interests and experience to:

> Microbiology Search Committee Department of Biological Sciences 371 Serra Mall Stanford University Stanford, CA 94305-5020

Materials should be received by December 15, 2001. The term of the appointment would begin September 1, 2002. Stanford University is an Equal Opportunity/Affirmative Action Employer. Women and minority candidates are encouraged to apply.

POSTDOCTORAL POSITIONS Heterotrimeric G Proteins Functional Genomics and Proteomics

Postdoctoral positions are available to study heterotrimeric G proteins. Projects involve characterizing the structural and functional diversity of the G protein subunit isoforms at both the DNA and protein levels and the relationship of this diversity to signal integration through G protein-coupled receptors. Opportunities exist to apply approaches using DNA array technologies, mass spectrometry, molecular modeling, and bioinformatics to problems involving G protein signaling pathways. Applicants should have a Ph.D. or equivalent degree with training in a field such as pharmacology, biochemistry, molecular biology, or cell biology. This laboratory is located in a geographically desirable area with many extracurricular advantages Please send curriculum vitae, a short statement of research goals and plans, and three letters of reference to: John Hildebrandt, Medical University of South Carolina, Department of Pharmacology, 173 Ashley Avenue, Charleston, SC 29425. Email: dingusj@musc.edu.

New Jersey City University seeks an Animal Anatomist or Developmental Biologist with expertise in electron microscopy. The tenure-track **ASSISTANT PROFESSOR** will teach undergraduate courses, supervise EM facilities and undergraduate research, write grant proposals, and have a terminal degree by appointment in September 2002. A cover letter, curriculum vitae, three references, and sample of research should be sent to: **Dr. Helen Hoch, Chairperson of Biology, New Jersey City University, Jersey City, NJ 07305** by December 1, 2001.



National Medical Services

Science in the Pursuit of Truth

Forensic DNA Technical Leader

Highly competitive salary range. This position is responsible for the overall supervision of DNA personnel and training, the technical review of case-work, and DNA quality assurance measures.

Forensic DNA Examiner

Highly competitive salary range. This journeyman position involves the performance of forensic serological testing, and the isolation, amplification, and typing of DNA in forensic case-work.

Postdoctoral Fellowships

One year term at \$40,000 per year. This unique opportunity is for conducting multidisciplinary research in the challenging field of forensic DNA testing. The ideal candidate would have a molecular biology background and strong interest in developing a forensic DNA application. Some benefits do not apply.

Competitive Benefits Package

- Medical and Dental Coverage Effective Day 1
- 401K Plan With Generous Match
- Life Insurance at 2 times Your Salary
- · Tuition Reimbursement after one year
- · Disability protection
- · Profit Sharing after one year
- · Bonus Plan for managers
- · Generous Paid Time Off
- In-House Training Seminars
- Excellent On-Site Fitness Center and Flu Shots

Contact: Please send a cover letter and resume to: Lawrence A. Presley, Director of Criminalistics (email: lawrence.presley@nmslab.com, Phone: 215-219-6760) or Marisa Buccini (Phone: 215-366-1215), National Medical Services, 3701 Welsh Road, Willow Grove, PA 19090.

DEPARTMENT OF INFECTIOUS AND TROPICAL DISEASES PATHOGEN MOLECULAR BIOLOGY & BIOCHEMISTRY



POSTDOCTORAL FELLOWSHIPS

Two postdoctoral positions for three years are available immediately to join an active virus research group comprising postdoctoral researchers. The laboratory is currently involved in various aspects of insect-borne double-stranded RNA virus research including reverse genetics, transcription/replication processes, virus assembly mechanisms, virus-host interaction(using fundamental structural genomes), protein purification/crystallisation and development of novel vaccines in which applicants should have a strong background.

Salary will be in the range $\pounds 20,052$, to $\pounds 28,830$ (R1A). The successful applicants will be placed on the scale according to relevant qualifications, skills and experience.

LSHTM is situated in Central London near Covent Garden and has a highly acclaimed reputation in tropical medicine. Informal enquiries can be made via e-mail at karen.clarke@lshtm.ac.uk

Further details are available from the Personnel Office at The London School of Hygiene and Tropical Medicine, Keppel Street, London WC1E 7HT (Tel: 020 7927 2203, Fax: 020 7636 4771, e-mail: personnel@lshtm.ac.uk) quoting reference PR2. Closing date 7 November 2001.

The Florida State University



College of Medicine

The newly established Department of Biomedical Sciences has statefunded, tenure-track positions available in organ systems physiology, pharmacology, anatomy, microscopic anatomy, development, biochemistry, molecular genetics, microbiology of infectious diseases, immunology, neuroscience and pathophysiology. Preference will be given to candidates with research interests in the molecular and cellular function of the genome as it relates to the subject areas listed above. Applicants will be expected to develop strong independent research programs. Although most of the positions are at the junior faculty level, exceptionally qualified senior faculty are encouraged to apply. Research will be supported by attractive start-up packages and new facilities. Teaching assignments will be customary for medical schools and the College is specifically seeking teaching excellence in the context of an integrated medical curriculum. Applicants should have a Ph.D. or equivalent in the appropriate field and two or more years of post-doctoral experience.

Applications should include a curriculum vitae, a brief summary of research interests, and the names of three references. Applications will be reviewed starting December 1, 2001 and should be received no later than January 2, 2002. Send email application (preferred) as a Microsoft Word formatted document to: biomed@med.fsu.edu or a hard copy to: Faculty Search, Department of Biomedical Sciences, College of Medicine, The Florida State University, 104 Duxbury, Tallahassee, FL 32306-4300.

FSU is an Equal Opportunity Employer. http://www.fsu.edu/~medicine

Faculty Positions at The James A. Baker Institute for Animal Health College of Veterinary Medicine

The Baker Institute for Animal Health seeks candidates for tenure-track faculty positions at the Assistant, Associate, or Full Professor levels. The Institute has a distinguished record of discovery in areas that benefit animal and human health. This commitment to excellence continues today, with strong, federally funded programs in infectious diseases and immunology, developmental and reproductive biology, and medical genetics/genomics (web site: <u>http://bakerinstitute.vet.cornell.edu/</u>).

Outstanding individuals with expertise and interests compatible with or complementary to the Institute's existing strengths are strongly encouraged to apply. The Institute offers competitive startup packages, new laboratory facilities, and a supportive and highly interactive research environment. Successful candidates will be expected to develop an extramurally-funded program in biomedical research and to participate in teaching programs for professional and graduate students.

Review of applications will begin immediately. Applicants should send a cover letter with their curriculum vitae, description of research goals, and names, addresses, phone, fax numbers, and email addresses of three references to:



Dr. D. F. Antczak, Director James A. Baker Institute for Animal Health College of Veterinary Medicine Cornell University, Ithaca, NY 14853 Telephone: 607-256-5633 FAX: 607-256-5608 e-mail: <u>dfa1@cornell.edu.</u>

Cornell is an Equal Opportunity/Affirmative Action Employer/Educator.

http://www.eornell.edu http://chronicle.com/jobs/profiles/2377.htm

DEAN OF THE GRADUATE SCHOOL OF BIOMEDICAL SCIENCES The University of Texas Health Science Center at San Antonio

The University of Texas Health Science Center at San Antonio (UTHSCSA) seeks a dynamic and experienced academic leader to serve as Dean of the Graduate School of Biomedical Sciences (GSBS). The successful candidate will be expected to develop and implement a vision for the GSBS that will strengthen the UTHSCSA's effort to advance to the top tier of academic health science centers. It is anticipated that the new Dean will initiate interdepartmental programs, especially in the area of Physician/Scientist training.

Responsibilities: The Dean is the chief advocate and spokesperson for the basic science departments and oversees extramural funding for the Graduate School as a whole. The candidate is also responsible for advancing the quality of graduate education and research endeavors in the Graduate School of Biomedical Sciences and fostering diversity and excellence in recruitment and retention of faculty, students, and staff. The Dean reports to the Executive Vice President for Academic and Health Affairs and meets bimonthly with the President of the UTHSCSA. This individual will serve on the President's Executive Committee and other key committees throughout the campus, community, state, and nation.

The Graduate School: The GSBS is the largest academic venue for Doctoral training in the biosciences in South Texas, providing unique academic and demographic missions and partnerships throughout the border region. It is one of five schools composing the UTHSCSA, the others being Allied Health, Dental, Medical, and Nursing. The GSBS consists of seven departments with 150 tenure-track faculty and 550 M.S. and Ph.D. students. It is also involved in teaching the basic science curricula throughout the UTHSCSA and administering interschool and intercampus graduate programs in pharmacological sciences, radiological sciences, allied health, dentistry, and nursing.

Qualifications: The applicant should have outstanding leadership, communication, and interpersonal skills. The successful candidate will have earned the Ph.D., M.D., M.D./Ph.D., and/or other relevant Doctoral degrees; demonstrated an outstanding record of scholarly achievement in biomedical research and education; and be qualified by academic performance to be appointed to the rank of **PRO-FESSOR**. The candidate will have successfully trained graduate students and Postdoctoral Fellows; secured and managed sponsored research grants; collaborated with colleagues across disciplines; and interfaced with educational, government, industrial, and philanthropic organizations. In addition, the candidate must have well-documented academic administrative abilities and experience in effective budget preparation and resource allocation.

The screening process will proceed upon receipt of completed applications and will continue until the position is filled. Applicants should submit a letter of interest; curriculum vitae; and the names, positions, addresses, and telephone numbers of four references to:

Chairperson of the Search Committee for Dean of the GSBS

Department of Pathology, Mail Code 7750 The University of Texas Health Science Center

at San Antonio 7703 Floyd Curl Drive San Antonio, TX 78229-3900 Website: http://www.uthscsa.edu Telephone: 210-567-4003

The UTHSCSA is an Equal Employment Opportunity/ Affirmative Action Employer. The UTHSCSA is committed to diversity and Equality in Education and Employment.

Engineering and Public Policy at Carnegie Mellon seeks **DOCTORAL STUDENTS** with technical backgrounds to address policy issues in energy and environmental systems; information technology; risk analysis and communication; and research and devel opment, innovation, and development. See website: http://www.epp.cmu.edu. Victoria Massimino, EPP, Carnegie Mellon, Pittsburgh, PA 15213 U.S.A.

POSITIONS OPEN

TENURE-TRACK SENIOR POSITION (PENDING LEGISLATIVE APPROVAL) Dalton Endowed Chair Environmental Sciences and Environmental Studies

The College of Arts and Sciences, Winthrop University, invites applications for the Dalton Endowed Chair in Environmental Sciences and Environmental Studies. Opening date is August 16, 2002. Applicants should hold the Ph.D. degree in a field having a strong relationship to environmental sciences/studies; experience in an interdisciplinary environmental program desirable. Responsibilities include directing the programs and teaching courses in the Environmental Sciences and Environmental Studies degree programs. Applicants should provide a letter of application; curriculum vitae; a statement of the candidate's vision of administration, teaching, and research for an interdisciplinary undergraduate program; and three confidential letters of reference by January 7 2002. Requests for the vacancy announcement and your application materials should be addressed to: Dr. Ralph A. Gustafson, Chair, Dalton Endowed Chair Search Committee, 202 Life Sciences Building, Winthrop University, Rock Hill, SC 29733. Winthrop University is an Equal Opportunity/ Affirmative Action Employer.

BIOCHEMIST/ANIMAL PHYSIOLOGIST

Washington's College's Department of Biology invites applications for an entry-level, tenure-track fac-ulty position at the rank of ASSISTANT PROFES-SOR beginning August 2002. Candidates must possess a Ph.D. A strong commitment to teaching and the development of a research program with undergraduate involvement is required. Teaching responsibilities include biochemistry, animal physiology, vertebrate anatomy, and introductory biology. There is an opportunity to offer an advanced class in an area of interest. Environmental focus desirable. Washington College, a selective college of 1,200 students, is located on a tributary of the Chesapeake Bay and orients much of its scientific research toward investigating problems associated with the Chesapeake Bay ecosystem. The college is within easy driving distance to Washington, D.C., Baltimore, Maryland, and Philadelphia, Pennsylvania. Send curriculum vitae; statements of teaching and research interests; undergraduate and graduate school transcripts; and three current reference letters by December 7, 2001, to: Dr. Rosemary H. Ford, Chair, 300 Washington Avenue, Chestertown, MD 21620. Review of applications will begin December 7, 2001. Washington College is an Equal Opportunity Employer. Women and minorities are especially encouraged to apply.

RESEARCH ASSOCIATE Imaging Facility, Consortium for Cell Migration Department of Cell Biology University of Virginia Charlottesville, Virginia

We are seeking a **RESEARCH ASSOCIATE**/ **IMAGING ENGINEER** to lead an imaging component of an NIH-funded, multiinstitutional cell migration consortium. The focus is to direct research aimed at developing state-of-the-art technologies for fluorescent imaging of molecular dynamics and associations in migrating cells, both *in vitro* and *in vivo*. Applicants should be familiar with microscopy and fluorescence imaging technologies.

This position will be open until filled. Application material including current curriculum vitae and names and addresses of three references should be sent to:

Rick Horwitz Department of Cell Biology Box 800732 University of Virginia Health System Charlottesville, VA 22908-9732 FAX: 434-982-3912

The University of Virginia is an Equal Opportunity/Affirmative Action Employer.

POSITIONS OPEN

FACULTY POSITION MOLECULAR MICROBIOLOGY Washington University School of Medicine St. Louis, Missouri

The Department of Molecular Microbiology at the Washington University School of Medicine is seeking outstanding Scientists for several tenure-track positions. We anticipate recruiting a number of new faculty at the ASSISTANT PROFESSOR level, although more senior applicants may be considered. We plan a rolling search process commencing February 1, 2002, and continuing until the positions are filled. Areas of particular interest include (but are by no means limited to) HIV and virology, microbial genomics and computational biology, protozoal and fungal pathogens, biofilms, and exciting new directions in cellular and structural microbiology. Additional information on our department and program can be found at website: http://www.microbiology. wustl.edu. We are seeking interactive individuals with a commitment to teaching and the establishment of a vigorous, cutting-edge, independent research pro-gram. Applicants should send detailed curriculum vitae, selected reprints, description of current and planned research interests, and arrange to have three letters of reference sent to: Dr. Stephen M. Beverley, Chairman of Molecular Microbiology, Attention: Faculty Search Committee, Washington University School of Medicine, Campus Box 8230, 660 South Euclid Avenue, St. Louis, MO 63110.

WUMS is an Equal Opportunity/Affirmative Action Employer. Women and minorities are especially encouraged to apply.

UNIVERSITY OF MICHIGAN ORAL AND MAXILLOFACIAL PATHOLOGY

The Department of Oral Medicine, Pathology, and Oncology at the University of Michigan School of Dentistry invites applications for a full-time, tenuretrack position at the ASSISTANT/ASSOCIATE PROFESSOR level. Applications are particularly encouraged from individuals with research interests including but not limited to bone and mineralized dental tissues or oropharyngeal oncology. The individual is expected to develop an independent, externally funded research program. Candidates must hold a D.D.S. or M.D. and advanced training in either oral and maxillofacial pathology or head and neck pathol-ogy and be Board certified. The position offers exciting opportunities to develop collaborations with the University of Michigan School of Dentistry, Medical School, and Comprehensive Cancer Center. Nominations and applications including curriculum vitae; statement of current and future research interests; and the names of five references should be submitted before December 1, 2001, to: Dr. Nisha D'Silva, Chair, Search Committee, Department of Oral Medicine/Pathology/Oncology, 1011 North University Avenue, Room 5217, Ann Arbor, MI 48109-1078

The University of Michigan is a nondiscriminatory / Affirmative Action Employer.

DIRECTOR, Jungers Multiple Sclerosis Research Laboratory at Oregon Health and Science University. Highly interactive neuroimmunology research group seeks applications from candidates to initiate and direct a new neuroscience research program relevant to MS. Scientists with research funding in neuroregeneration; neurodegeneration; neuroprotection; glialaxonal interactions; or myelin biology (particularly entailing use of genomics, proteomics, stem cells, or magnetic resonance imaging) are encouraged to apply. OSHU has a rich neuroscience community with a large faculty and graduate program. A generous recruitment package is available. Appointment will be commensurate with experience. Send letter, curriculum vitae, and names and addresses of five references to: Dr. Richard Jones, Jungers Search Committee, Department of Neurology L226, Oregon Health and Science University, Portland, OR 97201. Email: jonesric@ohsu.edu.

Assistant/Associate Professor Ovarian Cancer Center of Excellence Magee-Womens Research Institute/ University of Pittsburgh Cancer Center

The University of Pittsburgh, Department of Obstetrics, Gynecology and Reproductive Sciences in collaboration with Magee-Womens Research Institute and the University of Pittsburgh Cancer Institute are seeking tenure-track Assistant or Associate Professors to expand our laboratory effort in ovarian cancer. The successful candidate(s) will be expected to establish a vigorous independent research program that focuses on, but is not necessarily limited to, the role of genetic, hormonal and environmental factors in ovarian carcinogenesis. Additionally, the successful candidate(s) will be expected to participate in translational research studies in chemoprevention and early detection as part of the Ovarian Cancer Center for Excellence. Previous experience in the molecular biology of ovarian and/or breast cancer is highly desirable. Primary appointment will be in the Department of Obstetrics and Gynecology with secondary appointment in an appropriate basic science department. Competitive start up packages are available.

Interested applicants should send a letter describing their research interests and curriculum vitae to:

Holly H Gallion, MD Professor, Obstetrics, Gynecology and Reproductive Sciences Magee-Womens Hospital 300 Halket Street Pittsburgh, PA 15213 Hgallion@mail.magee.edu

The University of Pittsburgh and University of Pittsburgh Physicians are Equal Opportunity/Affirmative Action Employers. Minorities and women are encouraged to apply.

DIRECTOR NATIONAL BIOENERGY CENTER

The National Renewable Energy Laboratory (NREL) in Golden, Colorado, is the U.S. Department of Energy's premier laboratory for renewable energy and energy efficiency. Our mission is to develop renewable energy and energy efficiency technologies and practices, advance related science and engineering and transfer knowledge and innovations to address the nation's energy and environmental goals.

In this position, you will lead, plan and coordinate the staff and activities of bioenergy research and development. Provide leadership, strategic guidance, overall technical direction and management for the National Bioenergy Center (NBC), including coordinating NREL's activities with bioenergy work performed at the Oak Ridge National Laboratory (ORNL) and other organizations. Develop technical capability and produce world-class, quality R&D results to continue the NBC's leadership role in bioenergy research. Represent the NBC, NREL, ORNL and the Department of Energy and the interests of bioenergy programs to technical, industrial, stakeholder, political and international circles.

Requirements include a Ph.D. in Science or Engineering, or equivalent relevant education and experience. Minimum of 15 years of demonstrated success in managing and directing R&D programs. Expertise in one or more of the major research areas or working knowledge of all major research areas under position's span of responsibility. Must be familiar with the technical and market issues facing the bioenergy industry today and have an understanding of existing and emerging bioenergy markets. Recognized publications and contribution to bioenergy science and technology and a positive national and international reputation. Ability to lead a diverse NREL professional research staff of approximately 75–150 employees and interact with bioenergy research leaders at other institutions.

Our campus-style setting is located just west of Denver and is easily accessible from the Denver metro area and the foothills. For additional information and spplication instructions, please visit our Web site at **www.nrel.gov**.



NREL is an equal opportunity employer committed to diversity.



Postdoctoral Position to study DNA topoisomerases

A postdoctoral position is available to study the roles of DNA repair functions in cellular sensitivity to anti-cancer drugs targeting DNA topoisomerases. Current projects in the laboratory focus on identifying genes that participate in the repair of the unique DNA lesions that arise from topoisomerase inhibition, and the development of *in vitro* systems for studying these repair reactions. Candidates with a recent Ph.D. or M.D. degree and a strong background in either molecular biology or protein biochemistry are especially encouraged to apply.

St. Jude Children's Research Hospital is a premier biomedical research center that provides an outstanding scientific training environment. Highly competitive stipends and benefits are provided. Qualified candidates should send a letter detailing current scientific interests, curriculum vitae, and the names of three references to:

Dr. John L. Nitiss St. Jude Children's Research Hospital Molecular Pharmacology Department 332 N. Lauderdale St. • Memphis, TN 38105-2794 E-mail: john.nitiss@stjude.org Job Code #1551

SJCRH is an Affirmative Action/Equal Opportunity Employer.





Biochemist

3M Pharmaceutical's Signal Transduction team seeks a talented scientist to join in our efforts to isolate and characterize novel drug targets for new lead identification. This individual should have a Ph. D. in Biochemistry and a minimum 3 years of post doctoral experience. Prior experience including the study of protein, protein interactions and signal transduction pathways is desired. A working familiarity with mass spectrometry and its applications to protein chemistry and sequencing would be a plus. This individual should possess an innovative approach to their work, a desire to thrive in a strong team oriented research setting, and the interpersonal skills to influence and lead others.

3M provides an excellent benefits package with salary commensurate with experience. For confidential consideration please visit our web site at **www.3m.com/us/careers** and submit your resume on line or send two resumes (no phone calls or agencies) to:

NAS Reply Job #013496 Department 10MP65 Riverview Office Tower 8009 34th Avenue South Minneapolis, MN 55425-1619

Visit our website www.mmm.com

We Are An Equal Opportunity Employer M/F/D/V

POSITIONS FOR ASSOCIATE PROFESSORS Massachusetts General Hospital Harvard Medical School

Two faculty positions for ASSOCIATE and/or ASSISTANT PROFESSORS are available at the Cutaneous Biology Research Center of MGH/Harvard Medical School (website: http://www.mgh. harvard.edu/cbrc). Applicants must have a Ph.D. and/or M.D. degree, a strong record of research achievement, and a demonstrated ability to obtain extramural funding. Preference will be given to candidates whose research complements or extends existing faculty interests. Current faculty members investigate inductive signaling, transcriptional regulation, apoptosis, angiogenesis, carcinogenesis, extracellular matrix function, epithelial differentiation, and epithelial appendage development in vertebrate and invertebrate systems. Excellent core facilities and generous start-up funds are available.

All application materials must be received by December 1, 2001, for full consideration. Send curriculum vitae; reprints; brief statement of research directions; and names, addresses, and telephone numbers of three references to:

Paul F. Goetinck, Chair Faculty Search Committee Cutaneous Biology Research Center Massachusetts General Hospital-East Building 149 13th Street Charlestown, MA 02129

The MGH/Harvard Cutaneous Biology Research Center is a committed Equal Opportunity/Affirmative Action Employer. Minorites, women, handicapped, and veterans are encouraged to apply.

FACULTY POSITION Paleontology/Geobiology or Igneous Petrology/Geochemistry Department of Earth and Space Sciences University of California, Los Angeles

The Department of Earth and Space Sciences is seeking outstanding candidates for a faculty position (any level) from July 1, 2002. Areas of interest are either paleontology/geobiology or igneous petrology/geochemistry. Experience in working between disciplines and using numerical models in conjunction with observations or experiments is highly desirable. Applicants should have a Ph.D. or equivalent degree, a demonstrated record of innovative research, and an ability to inspire and educate undergraduate and graduate students. The Department has significant strengths in clastic sedimentology, cosmochemistry, radiogenic and stable isotope geochemistry, mineral physics, fluid and nonlinear dynamics, paleobiology, planetary science, continental tectonics and structural geology, seismology and geodesy, and space physics. It houses the Center for the Study of the Evolution and Origin of Life (CSEOL), the W. M. Keck Foundation Center for Isotope Geochemistry, and the UCLA branch of the NASA Astrobiology Institute.

To apply, send your curriculum vitae; a letter of application specifying the nature of the position sought; and the names, addresses (including e-mail), and telephone numbers of at least three persons who can provide recommendations to: ESS Search Committee, Department of Earth and Space Sciences, UCLA, 3806 Geology Building, P.O. Box 951567, Los Angeles, CA 90095-1567 U.S.A. preferably by November 30, 2001. UCLA is an Equal Opportunity Employer.

POSTDOCTORAL POSITION available immediately to study genomewide gene expression in hematopoiesis (*PNAS* 97:349–353, 2000; *PNAS* 97: 4162–4167, 2000; *PNAS* 98:3340, 2001; *Genomics* 77:149, 2001). Candidates with experiences in gene expression are encouraged to apply. Send curriculum vitae and names of three references to: Dr. San Ming Wang, Janet Rowley Laboratory, Section of Hematology/Oncology, University of Chicago Medical Center, 5841 South Maryland Avenue, MC2115, Chicago, IL 60637. Telephone: 773-702-6788; FAX: 773-702-3002; e-mail: swang1@midway.uchicago.edu.

POSITIONS OPEN

EXPERIMENTAL PHYSICAL SCIENTIST University of Colorado and National Institute of Standards and Technology (NIST) Boulder, Colorado

JILA, a premier academic research institute administered jointly by NIST and the University of Colorado, has a permanent faculty opening for a highly motivated and creative individual who will develop a world-class research program in multidisciplinary quantum science and/or precision measurement. The position requires the individual to establish an active research group of graduate, undergraduate, and postdoctoral students; acquire sources of outside funding; and participate in departmental teaching responsibilities. Candidates with a strong precision measurement/quantum/laser background and interest in rapidly emerging fields such as nanostructural technologies, biophysics, quantum information, and quantum optics are particularly encouraged to apply. The salary range is \$50,000 to \$80,000 depending on experience and qualifications.

Interested persons should send curriculum vitae and a detailed research proposal (two to three pages) as well as arrange for three letters of recommendation to be sent to: Search Committee, JILA, 440 UCB, University of Colorado, Boulder, CO 80309-0440. For further information, contact us at e-mail: jilasearch@jila.colorado.edu. Review of applications will begin on December 1, 2001. Complete applications with three letters of recommendation must be received by December 31, 2001.

The University of Colorado at Boulder is committed to diversity and Equality in Education and Employment. U.S. citizenship preferred.

STAFF SCIENTIST POSITION

The Laboratory of Advanced MRI (AMRI) of the National Institutes of Neurological Disorders and Stroke is recruiting for a Staff Scientist to expand its MR spectroscopy and imaging program. AMRI, part of the Laboratory of Functional and Molecular Imaging, aims to improve specificity and resolution in the study of human brain physiology and function through novel data acquisition and analysis methods. AMRI is currently heavily involved in spectroscopic imaging of brain disorders as well as somatotopy and retinotopy studies using high-resolution fMRI techniques based on array excitation and detection. It has access to significant amounts of instrument time on 1.5T, 3.0T, and 7.0T human scanners.

The applicant should have a Ph.D. degree in physics, mathematics, EE, BME, or closely related field and have strong interests in neuroimaging. Prior experience with GE, Siemens, or Bruker MR equipment is desirable but not a prerequisite. Salary for this position is very competitive and commensurate with experience. Please send a letter of interest, curriculum vitae, and three letters of recommendation to: Dr. Jozef Duyn, 10 Center Drive, Building 10, Room B1D118, MSC 1065, Bethesda, MD 20892. Communication by e-mail (including attached files) is welcome. E-mail: jhd@helix.nih.gov.

STAFF SCIENTIST POSITION

The Intramural Research Program of the National Institute on Aging, Baltimore, Maryland, is recruiting for a Staff Scientist position in the Laboratory of Molecular Gerontology (LMG). This is an initial five-year appointment for a highly motivated individual with a strong background in cellular and molecular biology. Experience in DNA repair and oxidative stress is required. The incumbent will have a major role in training staff and Postdoctoral Fellows and maintaining research continuity within the laboratory.

Candidates for this position must have a Ph.D. or M.D. Deadline for application is November 5, 2001. Send curriculum vitae and three reference letters to: Chair, LMG Staff Scientist Search Committee, c/o HR Staff Office, National Institute on Aging, NIH, Box 26, 5600 Nathan Shock Drive, Baltimore, MD 21224-6825, Attention: VA Number NIA-01-046. For further information, e-mail Dr. V. Bohr, Chief, LMG; e-mail: vbohr@nih.gov. NIH is an Equal Opportunity Employer.

26 OCTOBER 2001 VOL 294 SCIENCE www.sciencemag.org

POSITIONS OPEN

DEVELOPMENTAL BIOLOGIST Loyola University Stritch School of Medicine

The Department of Cell Biology, Neurobiology, and Anatomy invites applications for a tenure-track faculty position at the **ASSISTANT PROFESSOR** level. While the primary area of research interest is developmental biology, the areas of strength in the Department are neurobiology and immunology (see our website: http://www.lumc.edu/cbnanatomy).

The successful applicant must demonstrate proven abilities in establishing an extramurally funded research program. Applicants are also expected to have a strong commitment to medical and graduate education. Teaching experience in the biomedical sciences, especially developmental biology and histology, is considered a plus. Review of applications will begin on December 3, 2001. Complete curriculum vitae, description of research plans, summary of teaching interests, and three letters of recommendation should be sent to:

John Clancy, Jr., Ph.D., Professor and Chair Loyola University Stritch School of Medicine Department of Cell Biology, Neurobiology, and Anatomy

2160 South First Avenue Building 102, Room 5653 Maywood, IL 60153

Loyola University of Chicago is an Affirmative Action/ Equal Opportunity Employer and Educator.

TWO TENURE-TRACK POSITIONS NEUROSCIENCES

The Department of Biomedical Sciences at Marquette University invites applications for faculty at the **ASSISTANT** or **ASSOCIATE PROFESSOR** level. The departmental research focus is neuroscience with existing strengths in functional neuroanatomy, stress neurobiology, mechanisms of cell death, and the neuropsychopharmacology of drug abuse. The successful candidates will be expected to develop an independent, funded research program in an area of neuroscience. Faculty will participate in teaching either pharmacology or molecular biology to professional or undergraduate students. Review of applications will begin December 1, 2001. Send curriculum vitae, description of research interests, and the names of three references to: Search Committee, Department of Biomedical Sciences, Marquette University, P.O. Box 1881, Milwaukee, WI 53201-1881. Affirmative Action/Equal Opportunity Employer.

TWO POSTDOCTORAL POSITIONS Molecular Biology of Axonal Guidance and Neuroprotection

Two Postdoctoral positions are available to study the molecular mechanism of axonal guidance and neuroprotection. Work in our laboratory is directed toward the identification and analysis of molecules that regulate the formation of axonal pathways and neuronal survival. Candidates with experience in molecular biology or neurobiology are encouraged to send their curriculum vitae, statement of research interests, and the names of three references to: Dr. Renping Zhou, Laboratory for Cancer Research, College of Pharmacy, Rutgers, The State University of New Jersey, 164 Frelinghuysen Road, Piscataway, NJ 08854-8020. FAX: 732-445-0687; e-mail: rzhou@rci.rutgers.edu.

POSTDOCTORAL POSITIONS available immediately to characterize the protocadherin genc clusters with respect to the brain function using multidisciplinary approaches (see *Cell* 97:779, 1999; *Genome Research* 11:389, 2001). Recent Ph.D.s with strong background in biochemistry, molecular biology, and neuroscience are encouraged to apply. Please send a cover letter, recent reprints, curriculum vitae, and three reference letters to: Qiang Wu, Ph.D., Department of Human Genetics, University of Utah, 15 North 2030 East, Room 6150, Salt Lake City, UT 84112. E-mail: qiang.wu@genetics. utah.edu. The University of Utah is an Equal Opportunity/ Affirmative Action Employer.

Umeå Centre for Molecular Pathogenesis invites applications for one or two tenure track positions. UCMP is a research center with high competence in **structural biology**, and in the biology of **Drosophila** and **C. elegans**. We particularly welcome applicants in these fields. To promote the generation of new internationally competitive research teams, the center will provide generous resources and a unique research environment for research-oriented scientists on fiveyear tenure track contracts. Candidates must have a Ph.D. or equivalent and documented postdoctoral experience. An international Advisory Board will individually evaluate the top candidates.

The center was founded in 1994 and is located in a building that also includes the Department of Molecular Biology, a leading research establishment in Scandinavia. The scientific environment also includes leading groups in the fields of Cell and Developmental Biology, Microbiology, Immunology and Biochemistry.

Applicants should submit a CV and bibliography, a short description of current and planned research, and names and addresses (including fax and e-mail addresses) of 3 referees by December 3, to **Registrator**, **Umeå university, SE-901 87 Umeå, Sweden.** Please mark application with ref. No. 3134-2464-01.

For further information, contact Prof. Elisabeth Sauer-Eriksson (liz@ucmp.umu.se) or Prof. Dan Hultmark (dan.hultmark@ucmp.umu.se), or consult our web page (http:// soul.ucmp.umu.se).



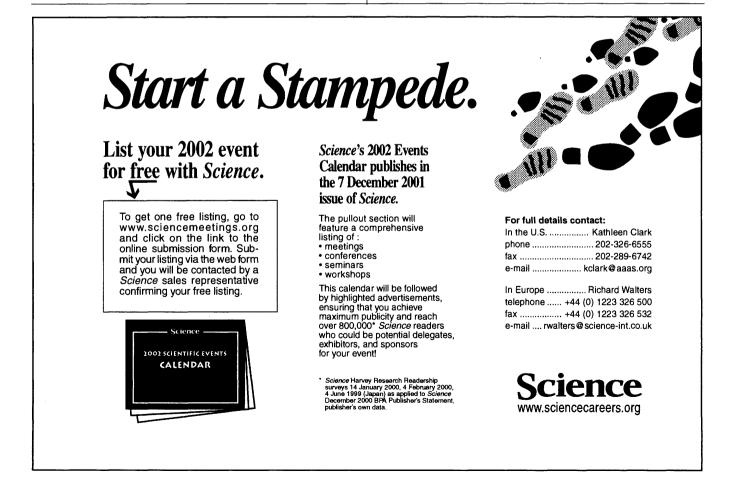
CENTER FOR LABORATORY ANIMAL CARE DIRECTOR

The University of Connecticut Health Center (UCHC) invites applications and nominations for the position of Director of its Center for Laboratory Animal Care (CLAC) reporting directly to the Associate Vice President for Research Administration. UCHC is a major research institution with a research program exceeding \$70M annually. CLAC is a 36,000 ft², AAALAC accredited facility, that includes a modern barrier facility for the housing of transgenic or immunocompromised mice.

The ideal applicant should qualify for a faculty appointment to an appropriate department in the School of Medicine or Dental Medicine, and possess either a Ph.D., DVM/VMD or both DVM/VMD and Ph.D., with postdoctoral training or experience in laboratory animal care (including management of barrier mouse colonies) and with an active, funded research program that can be integrated into UCHC's research strategic initiatives. These include (but are not limited to) genetics and developmental biology, microbial pathogenesis, vascular biology, neuroscience, immunology, and cancer. Applicants should have extensive experience in the management (fiscal and administrative) of laboratory animal care programs and barrier facilities.

Applicants should submit a letter of interest and curriculum vitae to: jobs@adp.uchc.edu. Please reference search code #2002-371. If you send a paper C.V. via US Mail, make it scanner friendly by using plain black text on white paper without graphics, italics, underlines or fancy fonts.

UCHC is an Equal Opportunity Employer M/F/V/PwD.





BIOINFORMATICS POSITIONS Bioinformatics Research Center Division of Human and Molecular Genetics Center Medical College of Wisconsin

The Bioinformatics Research Center (BRC) is charged with developing the expertise to conduct research in the areas of biomedical and clinical knowledge discovery through applications of mathematics, information science, and databases. BRC research activity includes projects involving the molecular genetics of cardiovascular diseases, discovery of new methods to effectively use model organisms of human diseases, and the creation of tools used to explore biomedical and clinical databases. One of the most impressive developments is the use of Web-based environments to collect, curate, and analyze clinical registry information.

The BRC currently has openings for the following: **RESEARCH SCIENTIST**: Perform and develop routine and complex computational and database methods for implementation in the BRC. Teach and train staff, students, and Postdoctoral Fellows in relevant techniques and analytical procedures. Participate in grant and manuscript preparation.

in grant and manuscript preparation. **ANALYST/PROJECT PROGRAMMER**: Provide design, development, implementation, and maintenance support for WWW database applications for biological and medical scientific research. CGI and Java application design and implementation and application interfacing with databases (Oracle). Create WWW applications to conduct data collection, validation, and analysis.

WEB DESÍGNER II: Define, design, implement, test, produce, and maintain websites supporting biological and biomedical research.

CURATOR: Data acquisition and analysis and evaluation and annotation of data to be incorporated into databases.

Applicants should send résumé/curriculum vitae and names of two references to: Medical College of Wisconsin, Attention: Employment Office, 8701 Watertown Plank Road, Milwaukee, WI 53226. Job Line Telephone: 414-456-8193; e-mail: mcw_emp@mcw.edu. Equal Opportunity Employer; Minorities/Females/Disabled/Veterans.

NEUROSCIENTIST POSITIONS ST. OLAF COLLEGE

St. Olaf College invites applications for two tenuretrack Neuroscientist positions, one in the Biology Department and one in the Psychology Department. Both positions begin September 2002. Applicants must have a strong interest in quality undergraduate teaching, be committed to liberal arts education, and demonstrate the potential to develop an active, undergraduate research program. See website: http://www.stolaf. edu/offices/dean-of-college/neuroscientist.html for more information. Applications are due November 9, 2001. A liberal arts college of the Lutheran Church (ELCA), St. Olaf College is an Affirmative Action/Equal Opportunity Employer and actively seeks diversity in its students, faculty, and staff.

POSITION AVAILABLE

RESEARCH ASSOCIATE in cardiovascular/ pulmonary pharmacology available for recent Ph.D. in pharmacology or physiology. Project related to pharmacology of purine receptors and the involvement of second messenger systems in smooth muscle and endothelial/epithelial cells. Salary commensurate with experience. Send curriculum vitae and three letters of recommendation to: Dr. S. Jamal Mustafa, Department of Pharmacology, East Carolina University, Greenville, NC 27858. Telephone: 252-816-2736. Affirmative Action/Equal Employment Opportunity. Accommodates individuals with disabilities. Applicants must comply with the Immigration Reform and Control Act.

POSITIONS OPEN

RESEARCH ASSOCIATE (FIVE OPENINGS) Center for Insect Science The University of Arizona

Postdoctoral Excellence in Research and Teaching (PERT) offers up to three years of support to outstanding candidates seeking advanced research training in insect science and preparation for the additional demands of an academic career. PERT trainees may select from among over 40 faculty research mentors representing a broad range of insect science disciplines: genetics, biochemistry, neurobiology, ecology, evolutionary biology, molecular/cellular biology, entomology, physiology, behavior. During the threeyear research training period, each trainee will participate in a two-semester pedagogy program. Trainees will receive preparation in additional areas such as the job application process; grantsmanship; and how to balance research, teaching, and service during the tenure and promotion process. Funded through the NIH, the starting salary is \$30,000 with an annual allowance of \$5,000 for research and \$1,000 for travel. Each trainee will have exclusive use of a laptop computer. Additional information about the Center for Insect Science and the PERT program is available website: http://cis.arl.arizona.edu/index. html. Applicants must have a Ph.D. in a related field and be U.S. citizens or permanent residents. To apply, please submit a detailed statement of research interests and career goals, curriculum vitae, and three letters of reference to: PERT, Center for Insect Science, P.O. Box 210106, University of Arizona, Tucson, AZ 85721-0106. Review of application materials will begin November 30, 2001, for appointments beginning August 2002 and will continue until positions are filled. The University of Arizona is an Equal Employment Opportunity/Affirmative Action Employer. Minorities/Women/Disabled/Veterans.

NIH SCIENTIFIC REVIEW ADMINISTRATOR POSITION Neuroscience of Vision

The Center for Scientific Review (CSR), National Institutes of Health (NIH), seeks a **NEUROSCIEN-TIST** with expertise in visual perception who is interested in serving as a Scientific Review Administrator (SRA). An SRA is responsible for understanding the current state and identifying future directions in visual neuroscience; selecting members of review panels; and managing study section meetings, which includes facilitating interactions with study section members and communicating the results of their deliberations to applicants and the staff of the NIH institutes that fund the research.

Applicants must have a Ph.D. or M.D. degree (or have equivalent experience), postdoctoral research training, a record of independent research accomplishment, and administrative experience. Salary is commensurate with experience. Submit curriculum vitae to: Christine Melchior, Ph.D., Chief, IFCN IRG, Center for Scientific Review, NIH, 6701 Rockledge Drive, Room 5176. MSC 7844, Bethesda, MD 20892-7844. E-mail: melchioc@ csr.nih.gov. NIH is an Equal Opportunity Employer.

STAIRCASE-ESCALANTE NATIONAL MON-UMENT, GS-301-12/13. Open to all qualified U.S citizens. Strong background in biological sciences and experience in natural resource management required. The Division is responsible for rangeland resources management, ecosystem management, wildlife management, fisheries and aquatic management, threatened and endangered species, botany/vegetation management, and fire management. Responsibility for developing, assigning, and ensuring completion of work by a staff of 18. Permanent/career conditional position; salary range: \$51,927 to \$80,279. Duty station: Kanab, Utah. For information, write: GSENM, Attention: Science Program Administrator, 180W 300N, Kanab, UT 84741 or contact Kate Cannon, Monument Manager; Telephone: 435-644-4330; e-mail: kcannon@blm.gov. More information on the Grand Staircase-Escalante National Monument is available at website: http://www.ut.blm.gov/ monument/.

POSITIONS OPEN

UNIVERSITY OF MINNESOTA

The University of Minnesota Supercomputing Institute seeks to hire a **BIO-INFORMATICS/COMPUTATIONAL GENOMICS SPECIALIST** to join a dynamic group that provides a high level of technical support for Researchers at the University of Minnesota Supercomputing Institute.

Please see website: http://www.msi.umn. edu/general/employment.html for details or send e-mail to: Ann Johns; e-mail: johns@ dtc.umn.edu. The University of Minnesota is an Equal Opportunity Educator and Employer.

BIOLOGIST: MOLECULAR BIOLOGY Laboratory of Neuroscience, Invertebrate Molecular Genetics, and Synaptic Physiology National Institute on Aging

The Laboratory of Neurosciences within the Intramural Research Program of the National Institute on Aging (NIA) in Baltimore, Maryland, invites applications for two Biologist positions. One will study the genetics of aging in C. elegans. Research will focus on lifespan control by insulin-like signaling from the nervous system and the identification of new genes with roles in aging. Experience with molecular biology skills is required. The second position will design and perform experiments to elucidate cellular signaling mechanisms underlying neuronal dysfunction and diseases. Experience with molecular biology skills including cloning, cell transfection, and RT-PCR analyses is required. Applicants should send curriculum vitae and/or résumés along with three letters of reference to: Human Resources Office, Box 26, National Institute of Aging, 5600 Nathan Shock Drive, Baltimore, MD 21224-6825. Refer to Vacancy Announcement Number NIA-01 045(GRC). Please reference this number on cover letter and curriculum vitae/résumé. Applications will be accepted until positions are filled. However, applications will be reviewed as they are received at the end of each month (i.e., September 30, 2001; October 31, 2001; November 30, 2001; December 31, 2001; etc. Website: http://www.grc.nia.nih.gov/Branches/ lns/httl/httl/htdocs/index.html. NIH is an Equal Opportunity Employer.

PHYSICIAN-SCIENTIST Cardiology Division University of California, San Francisco

The Department of Medicine at the University of California, San Francisco, invites applications for the position of Physician-Scientist in the Cardiology Division. The appointment will be at the level of AS-SISTANT, ASSOCIATE or FULL PROFES-SOR in the in-residence series. Candidates must have expertise and a record of accomplishment in molecular and cellular biology as applied to the cardiovascular system. An interest in molecular genetics and/or translational research would be particularly desirable. The successful candidate should also have full clinical training in cardiology and be prepared to spend 20% time in clinical and teaching activities. Please send curriculum vitae (including grant support), summary of research accomplished, research goals, and a list of three to five individuals who can be contacted as references to: William Grossman, M.D., Chief of Cardiology, Univer-sity of California, San Francisco, 505 Parnassus Avenue, Box 0124, San Francisco, CA 94143-0124. E-mail: grossman@medicine.ucsf.edu.

UCSF is an Affirmative Action/Equal Opportunity Employer. The University undertakes Affirmative Action to assure Equal Employment Opportunity for underutilized minorities and women, for persons with disabilities, and for Vietnam-era veterans and special disabled veterans.

MCP Hahnemann University





Faculty Positions

The Department of Biochemistry at MCP Hahnemann University School of Medicine operated by Drexel University has several tenure-track faculty openings at the Assistant, Associate and Full Professor levels. The department is being developed with an emphasis on understanding biochemical processes at a molecular level. Areas of interest include but are not limited to cell growth control, cell cycle, cancer biology, gene regulation, proteomics and structural biology. The department is in newly renovated space in center city Philadelphia. Candidates must have an MD and/or PhD with postdoctoral experience and a record of publications. Faculty will be expected to develop an independent research program that will attract extramural funding and to participate in teaching graduate and medical students.

Interested candidates should submit their curriculum vitae, statement of research interests, and names of three references to:

> Dr. Joseph Nickels Chair of Search Committee Professor, Department of Biochemistry MCP Hahnemann School of Medicine 245 N. 15th Street - MS #497 Philadelphia, PA 19102

Or electronically to Joseph.Nickels@drexel.edu Website: www.MCPHU.edu/medschool/depts/biochem/biochem_home.htm

FACULTY POSITIONS IN MOLECULAR BIOLOGY AND REGULATORY BIOCHEMISTRY University of Minnesota-Twin Cities

In conjunction with the completion of the new Molecular and Cellular Biology Building, and as part of campus-wide initiatives in genomics and proteomics, the **Department of Biochemistry**, **Molecular Biology and Biophysics** invites applications for full-time, tenure-track Assistant Professor positions to begin on or around July 1, 2002 in:

Molecular Biology: The Molecular Biology division seeks candidates in any area and particularly those who have interests in mammalian genome structure and function. **Regulatory Biochemistry:** The Regulatory Biochemistry division seeks candidates for one or more positions in the area of biological recognition and signal transduction.

Successful candidates will be expected to develop strong, externally funded research programs and contribute to the undergraduate, graduate and professional teaching programs of the department. The ability to interact collaboratively among a variety of disciplines will be strongly encouraged. All candidates must have a Ph.D. and/or M.D. degree. Desired experience includes at least two years of postdoctoral experience and a strong publication record.

Successful candidates will receive a substantial start-up package to establish their laboratories and a salary commensurate with education and experience. Applications will be accepted immediately and until the positions are filled. Please send curriculum vitae, a brief statement of current and future research, and three letters of recommendation that consider both research and teaching potential. Address these materials to either the Molecular Biology Search Committee or the Regulatory Biochemistry Search Committee, c/o Mr. Jeff Schaub, University of Minnesota, Department of Biochemistry, Molecular Biology and Biophysics, 6-155 Jackson Hall, 321 Church Street S.E., Minneapolis, MN 55455 or as an attachment to schaub@cbs.um.edu. For more information, please consult: http:// cbs.um.edu/BMBB.

> The University of Minnesota is an Equal Opportunity Educator and Employer.

The *Science* Meetings & Announcements Database

A comprehensive listing of events, grants announcements, courses & training, and more... in print and oniine.

Your ad in *Science* is automatically posted in the Meetings & Announcements database at **Sciencemeetings.org** and receives a free hyperlink from any e-mail or web address. This page is searchable by keyword, discipline, geographic region, or category/subject. It doesn't get any easier.

Is your event listed?

In the U.S. call Kathleen Clark at 202 326-6555 In Europe ring Richard Walters on +44 (0) 1223 326 500



Faculty Positions (Rank Open) Cell Biology Department of Biochemistry, Molecular Biology and Cell Biology Northwestern University

The Department of Biochemistry, Molecular Biology and Cell Biology seeks outstanding candidates for multiple full-time faculty appointments (rank open) in the area of cell biology.

Candidates should submit a curriculum vitae, a list of publications, a research summary and statement of future research objectives, a statement of teaching experience and interests, and four letters of reference to:

Faculty Search Committee Department of Biochemistry, Molecular Biology and Cell Biology Northwestern University Evanston, Illinois 60208-3500

Review will commence November 30, 2001 but the search will remain open until the positions are filled.

Women and members of minority groups are urged to apply. AA/EOE

Cancer Researcher/Director of the Center for Molecular Biology of Oral Diseases University of Illinois at Chicago

The UIC Cancer Center and Colleges of Dentistry and Medicine seek a scientist with a record of external funding in the molecular and/or cell biology of oropharyngeal cancer research. The successful candidate will direct the College of Dentistry's Center for Molecular Biology of Oral Diseases (CMBOD), hold a joint appointment in the College of Medicine's Department of Otolaryngology, and coordinate an interdisciplinary translational research program in oral cancer (e.g. gene therapy, pharmacology of antineoplastic agents, or other clinically relevant area). The UIC Cancer Center has designated oropharyngeal cancer as an area of emphasis. Faculty members of the CMBOD currently conduct funded basic research into oropharyngeal cancer and rhabdomyosarcoma. The Craniofacial Center, housed within the College of Dentistry, provides clinical care for one hundred new head and neck cancer patients annually. The College's Department of Oral Medicine & Diagnostic Sciences is developing a major focus on oropharyngeal cancer prevention, diagnosis, patient care, and research. Academic qualifications at the PhD/DDS/MD level are expected, and a record of funded research that qualifies the candidate for senior tenured joint appointments in the College of Dentistry and Medicine is required. Review of applications will begin immediately and continue until the position is filled. Send applications/nominations with a curriculum vitae and the names and addresses of three references to: Dean Bruce S. Graham, College of Dentistry, 801 S. Paulina Street, Chicago, IL 60612-7271. UIC is an Affirmative Action/Equal Opportunity Employer.



POSTDOCTORAL FELLOWSHIP Bioinformatics of Neoplasia

The Pathology Department and the Bioinformatics Research Center, Medical College of Wisconsin in Milwaukee, are seeking a Postdoctoral Fellow to pro-vide research and analysis support for World Wide Web database applications and computational analysis for biomedical, cancer-related research using microarray technology. The focus of activities will be in the development and analysis of biomedical data derived from microarray experiments in prostate cancer and hematopoietic disorders using the concepts, tools, and methods of bioinformatics. The projects can involve database design and implementation, CGI and Java application design, and the implementation and development of computational strategies and analysis for genomic and genetic data. Candidates must have a Ph.D. in biomedical sciences, math, computer science, or related area. Applicants should send curriculum vitae and names of two references to: Medical College of Wisconsin, Attention: Employment Office, Department PF10, 8701 Watertown Plank Road, Milwaukee, WI 53226. Job Line Telephone: 414-456-8193; e-mail: mcw_emp@mcw. edu. Equal Opportunity Employer; Minorities/Females/Disabled / Veterans

POSTDOCTORAL FELLOW Marshfeld Clinic/Marshfield Medical Research and Education Foundation

This Postdoctoral Fellow position in the laboratory of James K. Burmester, Ph.D., is oriented on med ical research in prostate cancer to investigate the genetics of familial prostate cancer and to devise novel treatment strategies. This position is part of a leading collaborative group with four recent publications identifying prostate cancer susceptibility loci and access to a large collection of patient samples. A background in molecular and cell biology is preferred. Marshfield Clinic is a leading health care facility with an active research and education foundation offering a unique opportunity for collaborative clinical and basic research efforts. Find out more at website: http:// www.marshfieldclinic.org. Marshfield Clinic, Human Resources Representative, 1000 North Oak Avenue, Marshfield, WI 54449. FAX: 715-387-5400; e-mail: hrshared@mfldclin.edu. Equal Opportunity Employer/Affirmative Action/Minorities/Females/Disabled/Veterans.

POSTDOCTORAL POSITIONS are available immediately for highly motivated individuals to study hedgehog (Hh) signaling pathway in animal development and human cancer (*Cell* 100:423–434, 2000). Current work focuses on the regulation of Gli transcription factors by Hh signaling. Experience in molecular biology, FPLC, mouse genetics, and/or developmental biology is desirable. E-mail or FAX cover letter, curriculum vitae, and reference information to: Baolin Wang, Ph.D., Cornell University Weill Medical College, 1300 York Avenue, Room W-404, New York, NY 10021. E-mail: baw2001@med.cornell.edu; FAX: 212-746-8824.

Equal Employment Opportunity/Affirmative Action/Minorities/Females/Disabled/Veterans.

POSTDOCTORAL POSITION University of Pittsburgh

A Postdoctoral position is available to study bFGF and FGFR-1-mediated signaling in malignant melanoma and tumor angiogenesis. Interested individuals with a Ph.D. or M.D. degree and experience in molecular biology and/or molecular genetics are invited to submit their curriculum vitae and the names and addresses of three references to: Dr. Dorothea Becker, Department of Pathology, University of Pittsburgh, BST E1050, 211 Lothrop Street, Pittsburgh, PA 15213.

POSITIONS OPEN

POSTDOCTORAL RESEARCH ASSOCIATE

The Biology Department of Brookhaven National Laboratory presently has an opportunity for a Research Associate to study the mechanisms of bacterial resistance and homeostasis to heavy metals. Our primary interest is to understand the structural basis of the regulatory pathways controlling heavy metal resistance and homeostasis in Ralstonia metallidurans CH34, a soil bacterium that is very well adapted to heavy metal pollution. Several heavy metal resistance pathways from this organism have been cloned and characterized. Since the genome of this organism was recently sequenced, proteomic approaches will be developed to further understand the functioning of this organism as a model for bacterial adaptation to heavy metals. This position will offer comprehensive training from molecular biology through protein and nucleic acids. Will join a dynamic, diverse group of Scientists with experience in environmental sciences, microbiology, molecular biology, and protein work. Re-quires a Ph.D. in the field of life sciences. Preference will be given to an enthusiastic Molecular Biologist with experience in protein purification and protein-DNA interactions. Interested candidates need to send the following within one month: curriculum vitae; description of research experience /interests; copies of their three most significant publications; and names, addresses, telephone numbers, and e-mail addresses of three references to: Dr. Daniel van der Lelie, Brookhaven National Laboratory, Biology De-partment, Building 463, Upton, NY 11973. Email: vdlelied@bnl.gov. BNL is an Equal Opportunity Employer. Women and minorities are especially encouraged to apply

RESEARCH ASSOCIATE Protein Discovery, Consortium for Cell Migration Department of Cell Biology University of Virginia Charlottesville, Virginia

We are seeking a **POSTDOCTORAL/RE-SEARCH ASSOCIATE** to lead a protein discovery component of an NIH-funded, multiinstitutional cell migration consortium. The focus is to develop novel localization-based, functional proteomic screens and apply them to identify novel proteins that regulate cell migration. Applicants should be familiar with some of the following: cell culture, library construction, fluorescence microscopy, expression cloning, image analysis, and basic molecular and/or cell biology.

This position will be open until filled. Application material including current curriculum vitae and names and addresses of three references should be sent to:

Rick Horwitz Department of Cell Biology Box 800732 University of Virginia Health System Charlottesville, VA 22908-9732 FAX: 434-982-3912

The University of Virginia is an Equal Opportunity/Affirmative Action Employer.

POSTDOCTORAL POSITION Molecular Biology

An NIH-funded Postdoctoral position is available immediately to study the role of the retinoblastomarelated protein p130 during the cell cycle and quiescence and differentiation in normal and transformed cells. Highly motivated individuals are encouraged to apply. Applicants must have a recent Ph.D. and expertise in molecular biology. Curriculum vitae including at least an international, peer-reviewed publication is also required. Send curriculum vitae, statement of research interests, and the names of three references to: Dr. Xavier Grana, Fels Institute for Cancer Research, Temple University School of Medicine, 3307 North Broad Street, Philadelphia, PA 19140. FAX: 215-707-5562; e-mail: xgranaam@ nimbus.ocis.temple.edu. Temple University is an Equal Opportunity/Affirmative Action Employer/Minorities/Females/Disabled/Veterans.

POSITIONS OPEN

NIH 2001 = $[OPPORTUNITY]^N$

Train at the bench, the bedside, or both. The NIH offers **POSTDOCTORAL** and **CLINICAL FELLOWSHIPS** as well as tenure-track positions.

> For details, visit our website: www.training.nih.gov

NIH is dedicated to building a diverse community in its training and employment programs.

PLANT MOLECULAR GENETICIST

The Department of Biological Sciences, Illinois State University, invites applications for a tenure-track ASSISTANT PROFESSORSHIP to begin August 16, 2002. Desirable areas of specialization include development, cell biology, functional genomics, and host-pathogen interactions. The successful applicant is expected to develop an extramurally funded research program; contribute to training of B.S., M.S., and Ph.D. students; and participate in our M.S. biotechnology sequence. Postdoctoral experience required. Teaching responsibilities include an undergraduate genetics course for majors and a graduate course in plant molecular biology. To assure full consideration, please send curriculum vitae; copies of three to four publications; three letters of recommendation; and a brief statement of research and teaching goals by December 3, 2002, to: Dr. Alan Katz, Genetics Search Committee Chair, Department of Biological Sciences, Campus Box 4120, Illinois State University, Normal, IL 61790-4120. Additional information at website: http://www.bio. ilstu.edu. Illinois State University is an Equal Opportunity. Affirmative Action University encouraging diversity.

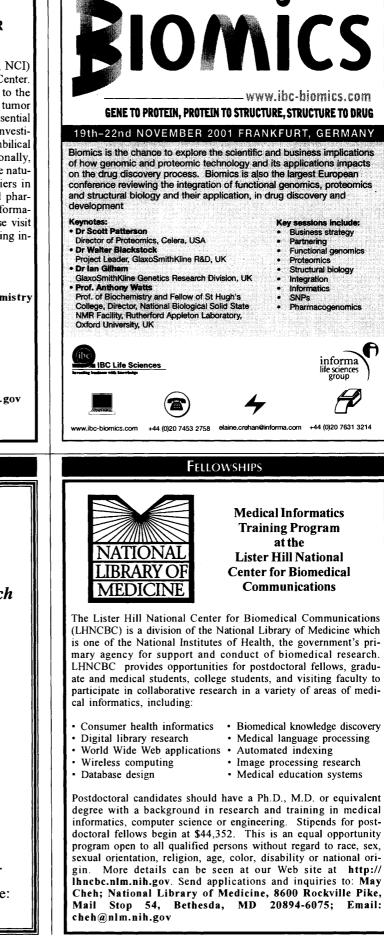
POSTDOCTORAL POSITIONS in lipid metabolism at the Danforth Plant Science Center. Several positions are available starting on or near January 15, 2002. Projects with openings involve structurefunction studies of fatty acid condensing enzyme, production of unusual fatty acids in oilseeds, analysis of metabolites of fatty acid and lipid metabolism using LC-MS, and characterization of plant lipid metabolism in different plant organs. A Ph.D. with a strong background in biochemistry is a minimum requirement, and experience with plants and molecular genetics is highly desirable. This research will be carried out at the Donald Danforth Plant Science Center in St. Louis, Missouri. The Center has recently moved into a new state-of-the-art facility dedicated to basic and applied plant research. Please send résumé and names of three references to: Jaworski Laboratory, c/o Ms. Billie Broeker, Human Resources, Donald Danforth Plant Science Center, 975 North Warson Road, St. Louis, MO 63132. The Donald Danforth Plant Science Center is an Equal Opportunity/Affirmative Action Employer and encourages applications from underrepresented groups including minorities, women, and people with disabilities.

VIROLOGY. Advanced Viral Research Corp. (ADVR), a leader in the development of peptidenucleic acid biopharmaceuticals, is seeking Ph.D.-LEVEL SCIENTISTS in molecular virology to investigate the effects of antiviral drugs on viral function including viral infection, replication, and enzyme activity. Candidates must be capable of directing independent research projects. Requirements include a Ph.D. or equivalent plus at least two years of postdoctoral experience. Expertise in basic and applied virology, molecular biology, and cell culture essential. Please submit curriculum vitae to: Human Resources Department, Advanced Viral Research Corp., 200 Corporate Boulevard South, Yonkers, NY 10701. FAX: 914-376-7368. Indicate Job Code 10/2 Vir. ADVR is an Equal Opportunity Employer.

THE ANGIOGENESIS RESOURCE CENTER

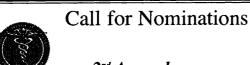
The Developmental Therapeutics Program (DTP, DCTD, NCI) has recently put into operation its Angiogenesis Resource Center. This effort was recommended by the Advisory Committee to the Director, NCI to facilitate research into the mechanisms of tumor angiogenesis and the development of drugs that target the essential tumor vasculature. The Center currently serves qualified investigators in the scientific community by providing human umbilical endothelial cells (HUVEC) and reference agents. Additionally, anti-angiogenesis testing is available without charge for pure natural products or synthetic compounds submitted by suppliers in universities, research institutes, government agencies, and pharmaceutical or biotechnology companies. For additional information on receiving any of these supplies and services, please visit our website at http://dtp.nci.nih.gov or contact the following individuals:

Mr. Richard F. Camalier Biological Testing Branch DTP, DCTD, NCI Fairview Center, Suite 205 1003 West 7th Street Frederick, MD 21701-8527 T: 301-846-5607 F: 301-846-6183 E: camalier@mail.nih.gov Dr. Ravi K. Varma Drug Synthesis and Chemistry Branch DTP, DCTD, NCI EPN, Room 831 6310 Executive Blvd. Rockville, MD 20892 T: 301-435-9159 F: 301-480-4817 E: varmar@exchange.nih.gov



MEETINGS AND ANNOUNCEMENTS

Prizes



2nd Annual Albany Medical Center Prize in Medicine and Biomedical Research

AWARD: \$500,000 Deadline for Nominations: January 15, 2002 Nomination Process:

> Contact Ronald A. Joyce, Secretary AMC Prize Selection Committee c/o Albany Medical Center 43 New Scotland Avenue, MC 119 Albany, NY 12208

FAX: 518-262-6769 EMAIL: amcprize@mail.amc.edu

Self-nominations will not be accepted.

For more information: Visit AMC's Web Site: www.amc.edu

POSTDOCTORAL POSITIONS for studies of proteolytic mechanisms in neurotransmission and neurodegenerative diseases. Studies in the laboratory of Dr. Vivian Hook will define the proteases and protease inhibitors involved in (1) producing active neuropeptide transmitters (enkephalin, β-endorphin, ACTH, and others); and (2) proteolytic mechanisms involved in Alzheimer's and related neurodegenerative diseases. Interdisciplinary approaches in molecular biology and genomics, protease/peptide biochemistry and proteomics, and cell biology/gene expression are utilized. A Ph.D. degree with experience in at least two of these disciplines is required. State-of-theart proteomic and genomic facilities are available at the new Buck Institute (website: http://www. buckinstitute.org) located near San Francisco, California. Projects involve research collaborations with University of California San Francisco and University of California San Diego. Job Code: VH/PD/01. To apply, submit curriculum vitae with names of three references to: Human Resources, VH, Buck Institute, 8001 Redwood Boulevard, Novato, CA 94945. E-mail: hr@buckinstitute.org; FAX: 415-899-1810.

Cardiovascular POSTDOCTORAL POSI-TIONS: The Departments/Divisions of Pharmaceutical Sciences, Pathology, and Cardiology have four positions available for Postdoctoral Trainees/Research Associates. All projects focus on cardiac pathophysiology and pharmacology and include studies on cytokines, alcoholic heart muscle disease, hyperhomocysteinemia, aging, and/or gender. Technical approaches include in vivo studies using biotelemetry techniques; functional analyses in intact tissue and isolated cells; histological and imaging techniques including fluorescent measurement of intracellular ions; biochemical and molecular biology approaches including cDNA microarray, Northern blot and Western blot; and electrophysiological studies using patch clamp techniques. Salaries are commensurate with experience. For information, contact: Richard H. Kennedy, Ph.D., Professor and Chair, Department of Pharmaceutical Sciences, Slot 522, University of Arkansas for Medical Sciences, 4301 West Markham Street, Little Rock, AR 72205. E-mail: kennedyrichardh@uams.edu.

POSTDOCTORAL POSITION Structure and Function of Opioid Receptors

Available to study the molecular recognition opiate ligands at opioid receptors using site-directed mutagenesis and molecular modeling. Applicants should have relatively recent Ph.D. in biochemistry or a related field and have expertise in molecular biology. The research involves the cloning of mutant opioid receptors and provides opportunity to work as a team with Medicinal Chemists, Computational Chemists, and Pharmacogists to investigate the structural biology of opioid receptors. Please send applications including curriculum vitae, brief description of past and future research interests, and the names of at least two references to: Professor Philip S. Portoghese, Department of Medicinal Chemistry, College of Pharmacy, University of Minnesota, 308 Harvard Street S.E., Minneapolis, MN 55455. E-mail: porto001@tc.umn.edu

The University of Minnesota is an Equal Opportunity Educator and Employer.

POSTDOCTORAL POSITION MAYO CLINIC

A Postdoctoral position available to study vascular biology of nitric oxide and application of recombinant nitric oxide sinthase(s) in prevention and treatment of vascular diseases. Successful applicant will be a member of multicollaborative group within the molecular medicine program at the Mayo Clinic. Experience in general molecular biology techniques, vascular biology, and/or gene transfer is desirable. Send curriculum vitae and three references to: Dr. Zvonimir S. Katusic, Department of Anesthesiology, Mayo Clinic, 200 First Street S.W., Rochester, MN 55905.

POSITIONS OPEN

POSTDOCTORAL POSITION Weill Medical College of Cornell University Department of Cell Biology

A Postdoctoral position is available immediately in the field of heart and coronary artery development. Research will address events occurring in the looping tubular heart with emphasis on progenitors of the epicardium and coronary vasculature. Applicants should have training in light and electron microscopy, immunocytochemistry, and cell culture procedures. Individuals with prior experience in chick embryology are preferred. Candidates must have a Ph.D. or an M.D. Submit cover letter, curriculum vitae, and a list of at least three Scientists who can provide letters of evaluation to: Dr. Donald A. Fischman, Harvey Klein Professor of Biomedical Sciences, Department of Cell Biology, 1300 York Avenue, A512, New York, NY 10021. FAX: 212-746-8175; email: fisch@med.cornell.edu; website: http:// www.med.cornell.edu/jobs. Equal Employment Opportunity / Affirmative Action / Minorities / Females / Disabled / Veterans.

POSTDOCTORAL POSITION Structural Biology

NIH has a position available to study the structure and function of cell surface immune receptors and their ligand recognition using both protein crystallography and molecular biology techniques. Our goal is to understand the function of immune receptors in infection and certain autoimmune disorders. Starting stipend is from \$30,800 to \$37,000 depending on experience. Interested candidates should send curriculum vitae and names of three references to: Dr. Peter Sun, Structural Biology Section, NIAID, National Institutes of Health, 12441 Parklawn Drive, Rockville, MD 20852. E-mail: psun@nih. gov. U.S. citizenship is not required. NIH is an Equal Opportunity Employer.

POSTDOCTORAL POSITIONS are available to (1) identify amino acids important in protein-protein interactions and inhibition of these interactions and (2) study molecular assembly, developmental, and cytokine regulation of intestinal lipoprotein biosynthesis. Research will involve molecular, cellular, and biochemical approaches involving protein purification, site-directed mutagenesis, and gene expression and repair. Pertinent research experience and Doctoral degree in life sciences is required. (*JBC* 273:25612; 274:19565; 275:29324; 276:31466). Dr. M. Mahmood Hussain, Anatomy and Cell Biology and Pediatrics, SUNY Downstate Medical Center, Brooklyn, NY 11203. FAX: 718-270-3732; e-mail: mahmoodhussain@netmail.hscklyn.edu.

POSTDOCTORAL POSITION

Postdoctoral Research Associate to work on projects in interferon and cytokine signaling. Previous experience with molecular biology techniques required. Salary is commensurate with experience. For fullest consideration, please send résumé and names of three references by November 30, 2001, to: Leonidas Platanias, M.D., Ph.D., Section of Hematology/Oncology (MC 734), University of Illinois at Chicago, Room 3150 MBRB, 900 South Ashland Avenue, Chicago, IL 60607. E-mail: Iplatani@uic.edu; FAX: 312-413-7963. UIC is an Affirmative Action/Equal Opportunity Employer.

POSTDOCTORAL POSITIONS HEART FAILURE

Two NIH-funded Postdoctoral positions available immediately to study gene regulation and molecular pathways relevant to pathogenesis of heart failure. Ph.D. required. Experience in basic molecular biology, cell culture, and transgenic mouse techniques will be helpful but not essential. Send curriculum vitae, reprints/abstracts, and three names of references to: Mahesh P. Gupta, Ph.D., Department of Surgery (Cardiac, MC 5040), University of Chicago, 5841 South Maryland Avenue, Chicago, IL 60637. Email: mgupta@surgery.bsd.uchicago.edu.

POSITIONS OPEN

POSTDOCTORAL POSITIONS are available immediately to study the biochemical and molecular aspects of cell-cell and cell-matrix interactions as well as signal transduction in leukocytes. A strong background in molecular biology, retroviral vectormediated gene transfer, or intracellular signaling is desirable. Projects include identification and characterization of genes responsible for a novel leukocyte deficiency.

Please send curriculum vitae and the names of three references to: Dr. Li Zhang, Department of Vascular Biology, Holland Laboratory of The American Red Cross, 15601 Crabbs Branch Way, Rockville, MD 20855. FAX: 301-738-0465; e-mail: zhangl@usa.redcross.org.

POSTDOCTORAL/TECHNICAL POSITION NEUROPHARMACOLOGY

Immediate opening for combined Postdoctoral and technical position. This position both supports our animal facility and performs self-administration and other behavioral studies. Background in neuropharmacology or neuroscience and experience with small animal surgery preferred. Send research interests, curriculum vitae, and references to: Kenneth Grasing, M.D., Associate Chief of Staff for Research, Kansas City VA Medical Center, Kansas City, MO 64128, E-mail: kenneth.grasing@med.va.gov.

Equal Employment Opportunity Employer.

ASSOCIATE RESEARCH SCIENTIST

Conduct clinical research in movement disorders, specifically Parkinson's disease. M.D. with specialization in neurology required. Must have at least four years of related experience and statistical background. Incumbent will have no clinical responsibilities/privileges. Contact: Karen Marder; e-mail: ksm1@ columbia.edu or send curriculum vitae to: G.H. Sergievsky Center, 630 West 168th Street, New York, NY 10032. Columbia University is an Affirmative Action/Equal Opportunity Employer.

POSTDOCTORAL POSITION available to study the pathogenesis and potential therapy for neurodegenerative diseases such as Alzheimer's and prion disease. Individuals with strong background in biochemistry/immunology, molecular biology, and/or animal models are encouraged to apply. Send curriculum vitae, recent reprints, and the names of three references to: Drs. Blas Frangione and Einar M. Sigurdsson, New York University, School of Medicine, Room TH427, 550 First Avenue, New York, NY 10016. E-mail: einar.sigurdsson@ med.nyu.edu.

POSTDOCTORAL POSITION

A Postdoctoral position is available in the Department of Psychiatry to study protein chemistry in neurodegeneration. The successful candidate must have demonstrated knowledge in combinatorial protein chemistry. Send curriculum vitae to: Giulio Maria Pasinetti, M.D., Ph.D., Department of Psychiatry, Box 1229, The Mount Sinai School of Medicine, One Gustave L. Levy Place, New York, NY 10029. E-mail: gp2@doc.mssm.edu.

POSTDOCTORAL POSITIONS available in enzymology to study kinetics of human and viral DNA/RNA polymerases and proteases. Background in enzyme kinetics, protein purification, recombinant DNA techniques, stopped-flow and rapid chemical quench measurements, virology, and synthetic chemistry is preferred. Send résumé and three letters of recommendation to: Dr. Zucai Suo, Department of Biochemistry, The Ohio State University, Columbus, OH 43210 U.S.A. E-mail: suo.3@osu.edu.

POSTDOCTORAL POSITION available immediately for the study of transcriptional regulation of cardiac development and function using mouse models. Experience in developmental biology and/ or molecular biology required. Send curriculum vitae and names of three references to: Jonathan Epstein, Associate Professor, Cardiovascular Division, University of Pennsylvania, 954 BRB II, 421 Curie Avenue, Philadelphia, PA 19104. Email: epsteinj@mail.med.upenn.edu.

POSTDOCTORAL POSITION: host defense mechanisms, oxidative damage, and proteomics. Positions available immediately to investigate killing mechanisms of bacteria by neutrophil oxidative and nonoxidative systems, e.g., oxidative damage of proteins and DNA. Preference will be given to candidates with experience in mass spectrometry, biochemistry of reactive species, and mutagenesis techniques. Send curriculum vitae, a brief overview of prior experience and interests, and names of three references to: Dr. Jay Heinecke (Box 8046) or Dr. Azzaq Belaaouaj (Box 8052), 600 South Euclid, St. Louis, MO 63110. E-mail: heinecke@im.wustl. edu or belaaouaja@msnotes.wustl.edu. Washington University is an Equal Employment Opportunity/Affirmative Action Employer.

BETH ISRAEL DEACONESS MEDICAL CENTER HARVARD MEDICAL SCHOOL

POSTDOCTORAL POSITIONS available immediately to study the regulation of genes in the endothelium using in vitro and in vivo model systems. Experience in molecular biology and transgenic/ knockout techniques is preferred. Send curriculum vitae and names of three references to: Dr. William Aird, Molecular Medicine RW-663, Beth Israel Deaconess Medical Center, 330 Brookline Avenue, Boston, MA 02215. FAX: 617-667-2913; e-mail: waird@caregroup.harvard.edu. Equal Opportunity Employer.

POSTDOCTORAL POSITION

A funded Postdoctoral position is available to study the molecular mechanism of mRNA polyadenylation in yeast, its regulation, and its interaction with other processes involved in mRNA synthesis and utilization. Experience in yeast genetics, biochemistry, and/or the molecular biology of nucleic acid/protein and protein/protein interactions is preferred. If interested, please send curriculum vitae and three references contacts to: Dr. Claire Moore, Molecular Biology and Microbiology, Tufts University School of Medicine, 136 Harrison Avenue, Boston, MA 02111. E-mail: claire.moore@tufts.edu

POSTDOCTORAL FELLOW

A Postdoctoral position is available immediately in a virology/immunology laboratory at the Aaron Diamond AIDS Research Center (ADARC). The ideal candidate should have a background in molecular biology and immunology to work on a project involving the characterization of immunological response in HIV-1 infected patients. Applicants should FAX their curriculum vitae and the names of two references to the attention of: Dr. Linqi Zhang; Telephone: 212-725-1126; e-mail: lzhang@adarc.org. The Aaron Diamond AIDS Research Center is an Affirmative Action/Equal Opportunity Employer.

POSTDOCTORAL POSITION: Rockville, Maryland. A position is available for a Chemist or Biologist with experience in mass spectrometry or protein chemistry to study the effects of formaldehyde on proteins and nucleic acids. Will join a multidisciplinary team of Pathologists, Molecular Biologists, and Chemists working to develop new approaches to the molecular diagnosis of disease. Position requires eligibility to immediately start work in the United States without visa sponsorship of any kind. Send cover letter, three references, and curriculum vitae with salary requireafip.osd.mil; FAX: 301-295-9507.

Three POSTDOCTORAL POSITIONS available for studying T cell development and function including VDJ recombination and its role in tumorigenesis, development of memory T cells and its application in vaccine development, and T cell homeostasis. A strong background in molecular biology and immunology is preferred. Send curriculum vitae to: Jianzhu Chen or Herman Eisen, Center for Cancer Research, MIT, E17-128, 40 Ames Street, Cam-bridge, MA 02139. E-mail: jchen@mit.edu.

POSITIONS OPEN

POSTDOCTORAL POSITION POSTDOCTORAL FELLOW/RESEARCH

ASSOCIATE (NIH funded), Developmental Biolo-gy, Georgetown University and DVAMC, Washington, D.C. Specific aspects of the position include transcription regulation, ligand/receptor interactions involving cytoskeletal proteins, intracellular and Golgi transport, and apoptosis (Mishra et al., Oncogene 1998, 1999; Cai et al., Mamm Genome 1999; Wein-stein et al., Mol. Cell Biol. 5122–5131, 2001) research is focused on genes expressed in embryonic endodermal stem cells, analysis of knockouts generated, and role in TGF Beta signaling. Candidates should in-clude a cover letter with curriculum vitae to:

> Dr. Lopa Mishra Director Molecular Biology Core Facility E-mail: lopamishra@yahoo.com

POSTDOCTORAL OPPORTUNITIES **Biochemistry Department** University of Missouri-Columbia

Research on animals, plants, and microorganisms. Details available at website: http://www.biochem. missouri.edu/postdoctoral.html. Send a letter of application, curriculum vitae, and names of three ref-Department, University of Missouri, 117 Schweitzer Hall, Columbia, MO 65211. To re-quest Americans With Disabilities Act accommodations, please contact our ADA Coordinator; Tele-phone: 573-884-7278; e-mail: adawww.showme. missouri.edu. MU is an Equal Opportunity/Affirmative Action Employer.

POSTDOCTORAL POSITION to study the mechanics of transcriptional control through DNA looping. The candidate should have a strong background in biochemistry or molecular biology, preferably experience with bacterial genetics and in vitro transcription, and the desire to work in an interdisciplinary laboratory with state-of-the-art single molecule techniques. Send curriculum vitae, statement of research interests, and three references to: Jens-Christian Meiners, Biophysics Research Division, University of Michigan, 4028 Chemistry, Ann Ar-bor, MI 48109-1055. E-mail: meiners@umich. edu. A nondiscriminatory/Affirmative Action Employer

FELLOWSHIPS

VISITING FACULTY AND POSTDOCTORAL FELLOWSHIPS (2002-2003)

University of Colorado at Boulder The Cooperative Institute for Research in Environmental Sciences (CIRES) under the sponsorship of the National Oceanic and Atmospheric Administration is offering up to six one-year Visiting Fellowships at the University of Colorado in Boulder. This is open to Scientists with research interests in the areas of the new CIRES research themes developed to better ex-plain and illustrate both the broad range of CIRES' science as well as the interdisciplinary nature and connectedness of our research. For complete text, see website: http://cires.colorado.edu/themes.html.

Application packets should include curriculum vitae, publications list, and a brief (two- to four-page) description of the proposed research. For Scientists/ faculty on sabbatical, please include salary support requirements. Applicants should request that letters of recommendation from three persons familiar with their qualifications be sent to the address below. Postdoctoral-level applicants must also submit undergraduate and graduate transcripts. Mail all application materials to:

> Human Resources **CIRES Visiting Fellows Program** 216 UCB University of Colorado Boulder, CO 80309-0216 U.S.A.

The deadline for receipt of application materials is December 15, 2001. The University of Colorado at Boulder is committed to diversity and Equality in Education and Employment.

POSITIONS OPEN

POSTDOCTORAL POSITIONS available immediately to study (1) posttranscriptional regulation of DNA topoisomerase II in anticancer drug resistance and (2) mechanisms of etoposide-induced leu-kemogenesis. Respond to: Jack C. Yalowich, Ph.D., Department of Pharmacology, University of Pitts-burgh School of Medicine, Biomedical Science Tower W1355, Pittsburgh, PA 15261. E-mail: yalowich@pitt.edu.

ANNOUNCEMENTS

FELLOWSHIP PROGRAM SMITHSONIAN INSTITUTION

GRADUATE STUDENT, PREDOCTORAL, POSTDOCTORAL, and SENIOR FELLOW-SHIPS in animal behavior, ecology, and environmental science including an emphasis on the tropics, Earth sciences and paleobiology, evolutionary and systematic biology, and history of science and technology. Tenable in residence at the Smithsonian facilities. Stipends and tenure vary.

Deadline: January 15 annually. Contact: Office of Fellowships, Smithsonian Institution, Desk S, Washington, DC 20560-0902. Telephone: 202-275-0655; e-mail: siofg@ofg.si.edu; website: http://www.si.edu/research+study. An Equal Opportunity Employer.

COURSES

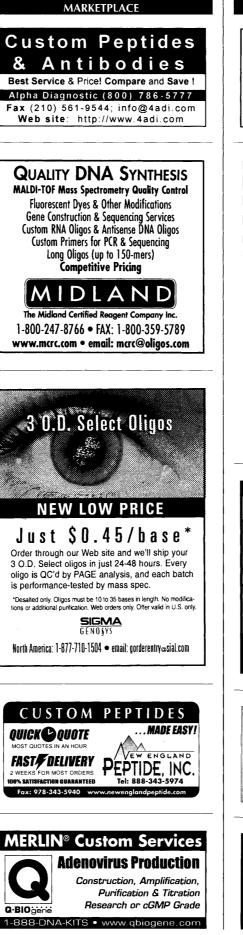
Short course on time-resolved fluorescence spectroscopy. The Center for Fluorescence Spectroscopy at the University of Maryland School of Medicine is offering a short course on "Principles and Applications of Time-Resolved Fluorescence Spectroscopy" in Baltimore, March 25-29, 2002. The course will cover basic and advanced topics in fluorometry including time- and frequency-domain measurements and Forster energy transfer. Advanced topics include chemical sensing, imaging, fiber optics, infrared fluorometry, two-photon excitation, instrumentation, confocal and multiphoton microscopy, protein fluorescence, DNA technology, high-throughput screening, metal-ligand probes, correlation spectroscopy, lanthanides, and immunoassays. Textbook, course materials, lunches, and refreshments will be provided. For further information, a schedule, and fees, please contact: Ms. Mary Rosenfeld or Professor J. R. Lakowicz, CFS, Department of Biochemical and Molecular Biology, 725 West Lombard Street, Baltimore, MD 21201. Telephone: 410-706-8409; FAX: 410-706-8408; e-mail: cfs@cfs.umbi. umd.edu; website: http://cfs.umbi.umd.edu.



www.sciencemag.org SCIENCE VOL 294 26 OCTOBER 2001

MARKETPLACE **MORE PRODUCTS** 5 **ON PREVIOUS PAGE** Modified Triphosphates 2' Fluoro 2' Amino ,O, Î ^{G, U, C} ,0,1.G. U. C Li,P,O,; LI,P,O,; но 2' Methoxy 3' Deoxy We carry over 80 modified NTPs Modified bases and sugars, dNTP and NTP Custom Synthesis Available TriLink BioTechnologies, Inc. www.trilinkbiotech.com Sales@trilinkbiotech.com 800-863-6801 fax 858-546-0020 **CUSTOM OLIGOS** 55¢ per base* 50 nm scale of synthesis Wide range of purifications, custom modifications, FRET probes Large scale synthesis available 800-788-4362 on-line: dna@keydna.com biosource.com





BIOOSYNTHESIS, INC. § PEPTIDES, OLIGOS 800-227-0627 www.biosyn.com **Quality Peptides & Antisera** Friendly, Personal Service www.genosys.com **Custom Peptide Synthesis** sequence analysis • IG, >70%, >80%, >95% purity • scales from 2 mg-l g synthesis up to 120 residues · variety of modifications available • mass spec & HPLC on every peptide satisfaction guaranteed **Polyclonal Antisera Service** antigen design assistance synthesis, conjugation and sera collection flexible protocol SIGMA GENOSYS North America Europe 1-877-710-1502 (+44) (0) 1223 839000 gintermation@sial.com info@sigma-genosys.co.uk DNA PEPTIDES Free Set-up and Call and Compare Desalting Gene Synthesis, Site Mutagenesis, **Protein Expression and more** COMPARE AND SAVE DNA Sequencing: as low as \$15 per run **Custom Anti-peptide Antibody** (including peptide synthesis) \$850 GENEMED SYNTHESIS 800.344.5337 Fax: 650.952.9540 Web Site: www.genemedsyn.com uidoelles that Works Great Zymed Performance: Including The Best Antibody To. DWD Lascastons I 1.450.871.44 Cuth **Custom Antibody Production** 1-800-533-4363 **図 ResGen**

MARKETPLACE



DETECT. DISCOVER. IDENTIFY.[™]

MAPMARKER[™] The Next Generation in Single-Stranded Fluorescent DNA Sizing Standards

• MapMarkers are compatible with most

fluorescent instrument systems.

MapMarkers provide consistent intensities

and migration patterns.

MapMarkers are available labeled with

your choice of the most commonly used

fluorescent d

MapMarkers are stable for 18 mor

berly stored.

BIOVentures, Inc. Navigating Genetic Diversity™

Phone: (615) 896-7353 • Fax: (615) 896-4837 Email: support@bioventures.com 1-800-235-8938 (US & Canada)

190	90	60	90	120	150	180	210	240	270	300	330	360	390	420	450
1400_	MapMarker 400														
1200_															
1000_		i			l										
800_	-														
600_															
400_															
200															
0 10	L.	M	W.	IJU		M	LI.	I.	UL	1			Ш		

Color

Above is an example of Rhodamine-X labeled MapMarker 70-400 sizing standard run on ABI model 310 Genetic Analyzer[™]. Marker bands are 70, 80, 90, 100, 120, 140, 160, 180, 190, 200, 220, 240, 260, 280, 300, 320, 340, 360, 380, and 400 nucleotides long. instant gratification.



QuickLigation Kit

FROM NEW ENGLAND BIOLABS

Advantages

- Fast 5 minutes for cohesive or blunt ends
- Convenient ligation performed at room temperature
- Flexible suitable for all common ligation reactions

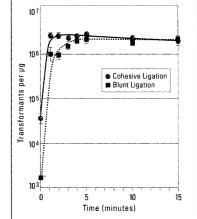
NEB Quick Ligation Kit

#M2200S 30 reactions #M2200L 150 reactions

Includes: Quick T4 DNA Ligase, 2X Quick Ligation Buffer, Protocols

Using the Quick Ligation Kit protocol, blunt and cohesive inserts were ligated into LITMUS 28 vector cut with either EcoR V (blunt) or Hind III (cohesive). Ligation products were transformed into chemically competent E. coli DH-5α cells.

Ligation in 5 minutes or less



- New England Biolabs Inc. 32 Tozer Road, Beverly, MA 01915 USA 1-800-NEB-LABS Tel. (978) 927-5054 Fax (978) 921-1350 email: info@neb.com
- New England Biolabs Ltd., Canada Tel. (800) 387-1095 (905) 672-3370 Fax (905) 672-3414 email: info@ca.neb.com

PRODUCTS YOU TRUST.

www.neb.com

TECHNICAL INFORMATION YOU NEED.

- New England Biolabs GmbH, Germany Tel. 0800/BIOLABS (0)69/305-23-140 Fax 0800/BIOLABX (0)69/305-23-149 email: info@de.neb.com
- New England Biolabs (UK) Ltd. Tel. (0800) 31 84 86 (01462) 420616 Fax (01462) 421057 email: info@uk.neb.com

DISTRIBUTORS: Argentina (11) 4816-0820; Australia (07) 5594-0299; Belgium (0800)1 9815; Brazil (011) 3666-3565; China 21-6495-1899; Czech Rep. 0800 124683; Denmark (39) 56 20 00; Finland (9) 584-121; France (1) 34 60 24 24; Greece (01) 5226547. Hong Kong 2649-9988; Israel (3) 9021330; Italy (02) 381951; Japan (03) 5820-9408; Korea (02) 556-0311; Netherlands (033) 495 00 94; New Zealand 0800 807809; Norway 23 17 60 00; Singapore 4457927; Spain (93) 401.02.10; Sweden (08) 30 60 10; Switzerland (061) 486 80 80; Taiwan (02) 28802913; Venezuela (2) 265-3386

