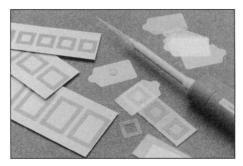
# PRODUCTS & MATERIALS

#### In Situ Sealing System

A new sealing system prevents reagent loss due to evaporation during in situ protocols. The system can improve the reliability of in situ hybridization and in situ gene amplification, which are often adversely affected by changes in salt concentration brought about by water loss on heating. The Hybaid



SureSeal provides a gas-tight seal between standard microscope slides and the system's coverslips at temperatures up to 97°C. The seals are available in three sizes to frame areas up to 1 cm², 2.4 cm², and 4.75 cm². Hybaid. Circle 138.

#### **Fluorescence Detector**

The FL3000 is an advanced fluorescence detector with sensitivity substantially enhanced by increased flow-cell illuminated volume and doubled lamp output power. The illuminated volume of the unit's flow cell has been increased from 3 to 8  $\mu$ l, providing a more intense signal from a given concentration of fluorescent material. Doubled lamp output power provides more photons to excite the compound being analyzed, resulting in greater fluorescent emission. Thermo Separation Products. Circle 139.

# Chemistry Drawing in Other Languages

ChemWindow and ChemIntosh chemistry drawing programs are now available in English, French, German, and Japanese. Each comes with a translated program interface

and documentation. The Japanese manual is a digest version and all others are full translations. SoftShell International. Circle 140.

# Kit Detects Carbohydrates on Glycoproteins

GlycoTrack detects the presence of carbohydrates on glycoproteins by specific labeling and membrane blotting. As little as 10 ng to 20  $\mu g$  of glycoprotein in 20  $\mu l$  can be analyzed. Samples ranging from cell lysates to pure proteins can be analyzed. Oxford GlycoSystems. Circle 141.

#### **Molecular Weight Markers**

Two sets of nonradioactive protein markers that provide reliable estimates of molecular weights in gels and protein immunoblots have both undergone improvements to offer the researcher added convenience. The formulation of rainbow-colored markers has been changed to enable direct loading onto gels following dilution with loading buffer, without the need for boiling. Their color allows easy tracking of proteins from gel electrophoresis through subsequent steps. They are available in two weight ranges. ECL markers are designed for use with electrochemiluminescence detection of proteins. They include a range of six biotinylated proteins covering the molecular weight range 14.4 to 97.4 kD. Amersham International. Circle 142.

#### **Risk Assessment Software**

Risk\*Assistant for Windows Version 1.1 is an update of chemical risk assessment software. The program rapidly estimates exposures and human health risks from chemical emissions or environmental concentrations of toxic chemicals at local sites. The system allows users to quickly screen risks to identify the most serious threats from local contamination and to set priorities for action. Users can also conduct specialized assessments of

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 is not implied. Additional information may be obtained from the manufacturers or suppliers named by circling the appropriate number on the Readers' Service Card and placing it in a mailbox. Postage is free.

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particular risks to gain critical information about cleaning up contaminated sites. The software supplies authoritative information on hazard, exposure, and risk. Thistle Publishing. Circle 143.

**Graphing and Data Analysis Software** 

GraphPad Prism Version 2 is a Windowsbased scientific graphing and data analysis program. The new version adds biostatistical analyses such as t tests, nonparametric tests, and analyses of contingency tables, making the program a complete biostatistics, curvefitting, and publication-quality graphing package. GraphPad. Circle 144.

**Gel Documentation System** 

The Imager makes use of a low-noise chargecoupled device camera and custom video processor to quickly capture data from such samples as stained gels, immunoblots, and thin-layer chromatography plates onto highdensity floppy disks in seconds. Images can be saved into more than 50 different file formats for flexible archiving and transport into other graphics or image analysis pro-



grams. Improved sensitivity is achieved by increasing exposure time and electronically reducing the background of the live image, which is not possible with standard photographic systems. Oncor. Circle 145.

Literature

Pall Biosupport Membranes for Molecular Biology Applications is a 12-page brochure that includes an applications guide to assist re-

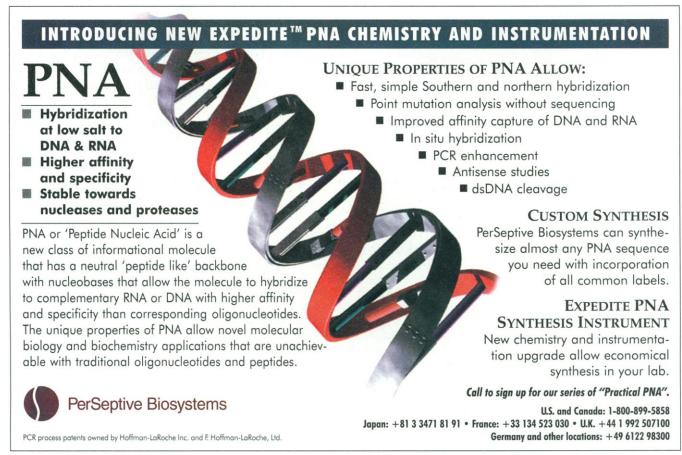
searchers in selecting the appropriate membrane for a specific application. Applications include immunoblotting; DNA, RNA, and protein immobilization; forensic testing; and genetic fingerprinting. Pall Corp. Circle 146.

reSolution Magazine illustrates the innovative applications of Leica products. Leica. Circle 147.

SolventTrak: The Chromatography Solvent Recycler for Purists describes a unit that reliably recycles pure solvent back to the mobile phase reservoir, significantly reducing expenses for costly solvents and disposal. JM Science. Circle 148.

Micropure-EZ Enzyme Removers is a technical data sheet on a membrane device that in a single 30-s spin can remove restriction and other enzymes from reaction mixtures containing double-stranded DNA. Amicon. Circle 149.

Axiophot 2 Photomicroscope and Axioplan 2 Universal Microscope are brochures on two instruments available in any configuration: from the classical, manual universal microscope to the fully motorized robotic microscope. Carl Zeiss. Circle 150.



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MEETINGS, CONFERENCES & SYMPOSIUMS For meeting, conference and symposium display advertisements, turn to page 1018.

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SCIENCE reserves the right, at its discretion, to edit or decline to publish advertisements submitted to it.

#### **POSITIONS OPEN**



#### Wayne State University

A tenure-track position at the rank of ASSISTANT/ASSOCIATE PROFESSOR is expected to become available in October 1996 for an individual to teach and conduct research in industrial hygiene or related disciplines. The candidate should have a Ph.D./M.D. degree, (CIH-preferred) and expertise in the application of modern analytical methods to environmental and exposure assessment. Qualified candidates should send curriculum vitae and a concise description of research interests to: Deepak K. Bhalla, Ph.D., Chair, Search Committee, Department of Occupational and Environmental Health Sciences, Wayne State University, 628 Shapero Hall, Detroit, MI 48202.

Wayne State University is an Equal Opportunity/Affirmative Action Employer. Wayne State University—People working together to provide quality service. All buildings, structures and vehicles at Wayne State University are smoke-free.

#### MOLECULAR EVOLUTION

The Department of Biology at Pomona College seeks applications for a tenure-track ASSISTANT PROFES-SORSHIP in molecular evolution, beginning fall 1996. Applicants should have demonstrated very broad training in biology, and have both teaching and postdoctoral experience. We seek a new colleague who will teach Genetics in our introductory course sequence and teach an upper-level course in Molecular Evolution. The successful candidate will be expected to establish an active research program that involves undergraduates; start-up funds are available. The appointee will demonstrate a commitment to teaching an ethnically diverse student body in a liberal arts setting. Send curriculum vitae, statement of research plans, description of teaching philosophy and interests, and three letters of recommendation to: Molecular Evolution Search Committee, Department of Biology, Pomona College, Claremont, CA 91711. Telephone: 909-607-2950; FAX: 909-621-8878. Applications must be received by March 8, 1996 to ensure full consideration. We particularly encourage applications from women and members of underrepresented groups.

#### POLYMER SCIENCE AND ENGINEERING University of Massachusetts at Amherst

The University of Massachusetts at Amherst invites applications for two tenure-track faculty positions in the Department of Polymer Science and Engineering. It is expected that both appointments will be at the ASSIST-ANT PROFESSOR level and will begin in January 1997. Applicants in all areas of polymer science and engineering will be considered; candidates with interest and experience in materials synthesis are especially encouraged to apply. Applicants should send curriculum vitac, three letters of recommendation, and brief statements of teaching and research interests to: Chair, Faculty Search Committee, Department of Polymer Science and Engineering, Conte Polymer Research Center, University of Massachusetts, Amherst, MA 01003. Interviews will commence by March 1, 1996. General information on the University of Massachusetts may be obtained from http://www.umass.edu/; general information on the Polymer Science and Engineering Department may be obtained from http://www.umass.edu/polymer/pse.html. The University of Massachusetts is an Affinnative Action/Equal Opportunity Employer. Women and minorities are encouraged to apply.

#### COGNITIVE/BEHAVIORAL NEUROSCIENTIST State University of New York at Stony Brook

The Department of Psychology invites applications for the position of ASSISTANT PROFESSOR, starting September 1996. Applicants should have a planned program of research using a systems approach to neural issues in cognition (including attention, perception, learning, memory, and language). Application deadline is March 18, 1996. Send curriculum vitae, reprints, and three letters of recommendation to: The Biopsychology Search Committee, Department of Psychology, USB, Stony Brook, NY 11794-2500. SUNY Stony Brook is an Affirmative Action/Equal Opportunity Employer.

#### **POSITIONS OPEN**

#### ASSISTANT PROFESSOR NEUROPATHOLOGY AT YALE

The Section of Neuropathology invites applications for a tenure-track position at the ASSISTANT PROFES-SOR level to begin July 1, 1996. Preference will be given to board-eligible or board-certified neuropathologists with an equally strong commitment to experimental research and service. The section has active clinical and training programs, excellent research resources, and links to major neuroscience and basic research faculty at Yale. Our major research programs emphasize neurodegenerative and slow virus diseases, and can substantially benefit interested investigators. However, we also welcome applications from others who can independently support different research initiatives. A strong background in cell or molecular pathology, or experimental models of CNS disease is desirable. Send letter, curriculum vitae, and three letters of reference to: Dr. Laura Manuelidis, Head, Section of Neuropathology, Yale University School of Medicine, P.O. Box 208062, New Haven, CT 06520-8062. FAX: 203-785-6381. Final application deadline for a July 1, 1996 appointment is March 31, 1996. Yale University is an Equal Opportunity Employer.

ASSISTANT PROFESSOR—The Department of Biometry and Genetics, Louisiana State University Medical Center, New Orleans, seeks a tenure-track Assistant Professor for an academic position involving research and teaching. The applicant should have a doctoral degree in human genetics or related discipline and, preferably, two years of postdoctoral experience. Training in statistical genetic methodology is highly desirable. Responsibilities for this position include the development of an independent research program and participation in the teaching of graduate students. The successful candidate will be a member of the Center for Molecular and Human Genetics and will have the opportunity to collaborate with molecular and clinical geneticists in a multidisciplinary environment that includes strong research programs in cancer and neuroscience. Send curriculum vitae, statement of research interests, and names of three references to: Dr. Bronya Keats, Department of Biometry and Genetics, Louisiana State University Medical Center, 1901 Perdido Street, New Orleans, LA 70112. Louisiana State University Medical Center is an Equal Opportunity/Affirmative Action Employer.

#### PROFESSOR AND DIRECTOR Institute of Marine Biotechnology National Taiwan Ocean University College of Fishery Science

Applications are invited for the position of PROFESSOR and DIRECTOR, Institute of Marine Biotechnology, National Taiwan Ocean University. The position is available immediately. The university campus is located at Keelung in the north of the island. It has nine faculty members and three affiliated faculty members who are active in molecular biology, enzyme technology and protein engineering, environmental biology, molecular toxicology, marine chemistry, developmental biology and cell biology studies. It has close interaction with other related departments in the campus as well as Academic Sinica and other well-known research institutes. It has an M.S. program with 30 graduate students now and will have a Ph.D. program this summer. Applicants should submit curriculum vitae and the names of three references by May 20, 1996 to: Dr. Tuu-iyi Chai, Search Committee, College of Fishery Science, National Taiwan Ocean University, Keelung, 20224 Taiwan. Telephone: 886-2-4622192 x5000; FAX: 886-2-4629125.

#### ASSISTANT PROFESSOR

Harvard Medical School, Department of Biological Chemistry and Molecular Pharmacology invites applications for one **TENURE-TRACK** position at the Assistant Professor level.

We seek individuals in the area of structural biology with a focus on NMR spectroscopy. Areas of interest include (but are not limited to) RNA structure, nucleic acid/protein interactions, and aspects of RNA function.

Applicants should submit by April 1, 1996 curriculum vitae, bibliography, and statement of research plans, and arrange for four letters of recommendation to be sent to: Professor Gerhard Wagner, BCMP, Harvard Medical School, 240 Longwood Avenue, C1-213, Boston, MA 02115.

Harvard University is an Equal Opportunity/Affirmative Action Employer and encourages the applications of qualified women and minorities

# BE PART OF THE NEW VA DIRECTOR MEDICAL RESEARCH SERVICE

The Department of Veterans Affairs (VA) invites applications for the position of Director, Medical Research Service. Currently, the Medical Research Service manages an appropriated budget of approximately \$200 million and supports the biomedical research of more than 2,000 VA scientists, more than 70% of whom are physicians. In addition, VA scientists receive more than \$275 million in research support from extra-VA sources, such as the National Institutes of Health.

VA's research program is strongly committed to support of patient-oriented research across the entire spectrum from basic science to clinical applications of knowledge. The incumbent is responsible for policy development, and the management of peer review of all investigator-initiated medical research studies. He/she will have overall responsibility for the managerial and scientific aspects of the medical research programs of VA. The individual selected will play a critical role in the organizational restructuring of this program.

Applicants must be U.S. citizens, have both strong scientific and managerial backgrounds, and be a physician or dentist or hold a Ph.D. Salary is \$79,684-\$98,960 for non-clinicians, \$127,514-\$164,718 for physicians, and \$106,014-\$110,014 for dentists.

If qualified, please send your curriculum vitae to:

Department of Veterans Affairs Management Support Office (163B) 810 Vermont Avenue, NW Washington, DC 20420

Applications must be received no later than March 29, 1996.

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Fort Dodge Animal Health, a Division of American Home Products Corporation and a leading manufacturer in veterinary biologicals and pharmaceuticals, has immediate openings in our department of Biological Research and Development.

The successful candidate should possess:

- · A PhD in virology or equivalent.
- MS in microbiology or immunology or equivalent field, with 5+ years of experience in viral research.

The primary responsibility of the successful candidate will be to perform works leading to the licensure of veterinary biologicals. These works include, but are not limited to, designing and conducting *in vitro* and *in vivo* studies, analyzing data, and preparing protocols and reports.

In addition to an excellent career opportunity, we will provide the selected individual with competitive compensation and a complete corporate benefit program.

To apply, submit curriculum vitae, including salary requirements, to:



Personnel Director FORT DODGE ANIMAL HEALTH P.O. Box 518 Fort Dodge, IA 50501

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#### Faculty of Pharmacy University of Toronto

Applications are invited for a full-time tenure track faculty position in pharmaceutics. The Faculty is interested in recruiting candidates whose background and current research concerns the physical chemistry of one of the following areas: the interactions, stability, delivery or targeting of biopharmaceuticals (e.g., peptides, proteins, DNA); interfacial sciences; or self-assembly. The rank of the position will be commensurate with experience. The successful candidate must establish an independent, externally funded research program, participate in the supervision of graduate students and have a strong commitment to teaching undergraduate and graduate students.

The University of Toronto and its affiliated institutions maintain a strong presence in physical, biological and medical sciences. Interdepartmental collaboration is encouraged, and such activities are supported at the graduate level through cross-appointments, joint courses and multidisciplinary programmes.

The successful candidate must have a Ph.D. degree and relevant postgraduate research experience. Review of applications will begin May 1, 1996. To apply, send a current curriculum vitae, an outline of future research interests, and arrange to have three letters of reference sent to Dr. Donald Perrier, Dean, Faculty of Pharmacy, University of Toronto, 19 Russell Street, Toronto, Ontario M5S 2S2 Canada.

In accordance with its Employment Equity Policy, the University of Toronto encourages applications from qualified women and men, members of visible minorities, aboriginal peoples and persons with disabilities.

# FACULTY AND POSTDOCTORAL POSITIONS DEPARTMENT OF PHYSIOLOGY AND BIOPHYSICS UNIVERSITY OF MISSISSIPPI MEDICAL CENTER

Applications are invited for postdoctoral positions and for two tenure-track faculty appointments at the rank of assistant, associate or full professor. Faculty applicants must have a Ph.D. and/or M.D. and postdoctoral training and must be permanent residents or citizens of the United States. We are seeking individuals with expertise in molecular and/or cellular physiology with research interests that complement existing areas of excellence in cardiovascular and/or renal physiology. Special consideration will be given to candidates with research interests in the areas of regulation of extracellular matrix, angiogenesis, or hypertrophy of vascular or cardiac muscle. Successful faculty applicants are expected to establish a nationally recognized research program supported by extramural funding and contribute to the teaching of graduate and medical students. The department has a large nucleus of faculty in the areas of cardiovascular and renal physiology and offers excellent opportunities for collaboration in several areas of physiology and pathophysiology, including hypertension, heart failure, diabetes, and atherosclerosis.

Applicants should send a curriculum vitae, an indication of past and current research funding, a statement of research interests and career goals, and the names of at least three references to:

Dr. John E. Hall Department of Physiology and Biophysics University of Mississippi Medical Center Jackson, MS 39216-4505

Equal Opportunity Employer, M/F/D/V.

### Cellular Electrophysiologist

The Membrane Biochemistry and Biophysics department at Merck Research Laboratories in Rahway, New Jersey has a career opportunity for a cellular electrophysiologist. The successful candidate will conduct in vitro experiments on invertebrate ion channels as part of a research team developing new drugs for animal health.

The position requires a BS, MS or equivalent in Physiology, Pharmacology or related field. Familiarity with a variety of voltage clamp techniques and associated methods of online data acquisition is required. Familiarity with tissue culture techniques and methods for preparing primary cultures of nerve and muscle cells is desirable. A strong background in quantitative analysis of experimental data, especially in membrane biophysics, is also desirable.

Merck offers a competitive salary, an excellent benefits package, opportunities for professional growth and pleasant working conditions. Qualified applicants should send their resumes to: Manager, Human Resources, Ad#175, Merck Research Laboratories, P.O. Box 2000, RY80-A3, Rahway, NJ 07065. EEO/AA/VH/Employer.



#### EYE AND VISION RESEARCH University of Washington Seattle, Washington

Applications are invited for a FACULTY appointment in eye and vision research to join a team of established investigators with primary interests in retinal morphology, biochemistry, development, and disease. Preference will be given to candidates with expertise in molecular and/or cell biology who have demonstrated research potential and a record of extramural funding. Candidates should possess a Ph.D. or M.D. and interest in eye diseases, ability and interest in teaching, and desire to collaborate with both basic scientists and clinicians. The appointment will be at the faculty rank of professor, associate professor, or assistant professor, commensurate with qualifications.

Submit curriculum vitae, including research funding; three references; and a description of research interests, accomplishments, and teaching experience to the search committee chair: Richard P. Mills, M.D., University of Washington School of Medicine, Department of Ophthalmology, Box 356485, Seattle, WA 98195-6485.

The University of Washington is an Affirmative Action/Equal

Opportunity Employer.

#### HEAD DEPARTMENT OF BIOCHEMISTRY

The College of Agriculture and Life Sciences and the College of Physical and Mathematical Sciences, North Carolina State University (NCSU), are searching for an outstanding individual to administer the teaching and research programs of the Department of Biochemistry.

Applicants should possess an established reputation in biochemistry, a Ph.D. degree, and research and teaching experience commensurate with the rank of PROFES-**SOR.** Administrative experience or demonstrated leadership potential preferred. The successful candidate is expected to conduct a vigorous personal program of rescarch, teaching, and professional development. Applications should include a résumé with publication list, names and addresses of three references, and a letter describing interests and qualifications. Date available is July 1996. Application deadline April 15, 1996. Address to: Dr. Ernest Hodgson, Biochemistry Head Search Committee, Department of Toxicology, Box 7633, NCSU, Raleigh, NC 27695-7633. An Equal Opportunity/Affirmative Action Employer.

#### EXERCISE MOLECULAR PHYSIOLOGIST

FULL PROFESSOR. The School of Kinesiology at the University of Illinois at Chicago invites applications for a faculty position at the level of Full Professor. Candidates must have a Ph.D. or M.D. and have a nationally and internationally recognized record of scholarly research in the field of exercise molecular physiology. Preference will be given to established investigators whose research interest is in understanding molecular mechanisms underlying the atrophy and hypertrophy of skeletal muscle associated with aging and/or exercise. Interested individuals should send a complete curriculum vitae and a statement of research interests and future plans to: **Karyn** Esser, Ph.D., School of Kinesiology, M/C 194, University of Illinois at Chicago, 901 West Roosevelt Road, Chicago, IL 60606-1516. Full consideration will be given to applications received by April 15, 1996. The University of Illinois at Chicago is an Affirmative Action/Equal Opportunity Employer.

MEDICAL LABORATORY SCIENCES PRO-GRAM DIRECTOR: Oakland University School of Health Sciences invites applications for a Program Director and tenure-track faculty position, fall 1996. Responsibilities include program administration and development, teaching in specialty area, advising, research, service and professional activities. Minimum qualifications include professional certification, Ph.D. in a discipline relevant to the field of medical laboratory sciences, and three to five years of clinical experience. Teaching and administrative experience in a university setting, proven grantwriting ability, and publication history highly desirable Rank and salary commensurate with qualifications and experience. Qualified applicants should send a curriculum vitae, statement of research interests, and the names and addresses of three references by April 1, 1996 to: Carl Vann, Ph.D., School of Health Sciences, Oakland University, Rochester, MI 48309-4401. Oakland University is an Affirmative Action/Equal Opportunity Employer that encourages applications from women and minorities

#### **POSITIONS OPEN**

ACADEMIC DIVISION HEAD. The School of Biological Sciences at the University of Missouri-Kansas City (UMKC) seeks a distinguished researcher and educator with a proven ability to attract extramural funds in biochemistry and molecular biology. The division head (director) oversees the academic division (department) and directs the expansion of its Ph.D. program in molecular biology and biochemistry. The successful candidate will have a demonstrated record in extramurally funded research accomplishments and excellence in graduate teaching and supervising Ph.D. students. Interested applicants should have carned tenure at a U.S. university and have the capability to administer a complex department with duties in the undergraduate and graduate programs and courses to the health professions. This person is expected to develop a growing academic interdisciplinary program including the recruitment of additional faculty with proven ability for attracting independent external research funding in molecular recognition, with emphasis in macromolecular structure and organization, and molecular basis of signal transduction. Selection of candidates will begin immediately and continue until a successful candidate is identified. Applicants should submit a curriculum vitae, an outline of research interest, and names of three references from academic institutions. Send correspondence to:

> Dean M. Martinez-Carrion University of Missouri-Kansas City Dean's Office School of Biological Sciences 5100 Rockhill Road Kansas City, MO 64110

UMKC is an Equal Opportunity/Affirmative Action Employer.

#### ASSISTANT PROFESSOR OF MICROBIOLOGY

The Department of Veterinary and Microbiological Sciences at North Dakota State University invites applications for a tenure-track faculty position in microbiology at the ASSISTANT PROFESSOR level. The successful candidate will be expected to teach an undergraduate course in microbiology; develop a graduate-level course in his or her area of expertise; supervise graduate students; and establish an active, independent research program using contemporary approaches to study infectious disease pathogenesis that will complement existing programs in bacteriology, immunology, and virology. Opportunities also exist to participate in veterinary diagnostic micro-biology. Candidates must have a Ph.D. degree in micro-biology or related field, research experience in pathogenesis of infectious disease, evidence of recent research accomplishments, and demonstrated oral and written communication skills. Postdoctoral research experience, teaching experience, evidence of grantsmanship ability, and diagnostic microbiology experience are preferred. Review of applications will begin on March 15, 1996 and will continue until the position is filled. Send curriculum vitae, statements of rescarch and teaching interests, and the names, addresses, and telephone numbers of at least three references to: Eugene S. Berry, Ph.D., Chair, Search Committee, Department of Veterinary and Microbiological Sciences, North Dakota State University, Fargo, ND 58105. Telephone: 701-231-7520; FAX: 701-231-7514; Email: berry@plains. nodak.edu. North Dakota State University is an Equal Opportunity Institution.

#### WILDLIFE HABITAT MANAGEMENT

ASSISTANT PROFESSOR in Wildlife Habitat Management, tenure-track, nine-month faculty position available September 1996 in the Department of Range, Wild-life, and Fisheries Management, Texas Tech University. Summer salary is normally available through a combination of teaching and research. The position is approximately 50% teaching and 50% research. The applicant should have a Ph.D. in either wildlife science, range science or closely related area. Preference will be given to individuals with experience and/or expertise relative to wildlife habitat management on rangelands (e.g. Big Game or Upland Game). Applicants should send curric ulum vitae, transcripts, and description of research interests, and have three letters of recommendation forwarded by April 5, 1996 to: Dr. Ernest B. Fish, Search Committee Chairman, Department of Range, Wildlife, and Fisheries Management, Texas Tech University, Lubbock, TX 79409-2125. Telephone: 806-742-1983; FAX: 806-742-2280. Texas Tech is an Affirmative Action/Equal Opportunity Employer.

#### **POSITIONS OPEN**

#### FACULTY POSITION University of Texas Medical Branch at Galveston

Applications are requested for a tenure-track faculty position at the level of ASSISTANT or ASSOCIATE PROFESSOR in the Sealy Center for Oncology and Hematology, a newly established biomedical research facility at the University of Texas Medical Branch in Galveston. Active research areas at the Center include viral oncogenesis, transcriptional regulation, and the role of protein kinases in hematopoietic signal transduction. The candidate should hold a Ph.D. and/or M.D. degree and should have an established, productive research program, preferably in the field of cell cycle regulation. Applicants should send curriculum vitae and a description of research interests to: Dr. Alan P. Fields, Faculty Search Committee, Sealy Center for Oncology and Hematology, University of Texas Medical Branch, Medical Research Building, Room 9.104, 301 University Boulevard, Galveston, TX 77555-1048. Equal Opportunity / Affirmative Action Employer, Minorities/Females/Disabled/Veterans. Hires only employees authorized to work in the U.S.

#### GRAZING MANAGEMENT

ASSISTANT PROFESSOR in Grazing Management, tenure-track, nine-month faculty position available September 1996 in the Department of Range, Wildlife, and Fisheries Management, Texas Tech University. Summer salary is normally available through a combination of teaching and research. The position is approximately 50% teaching and 50% research. The applicant should have a Ph.D. in range science or closely related area. Preference will be given to individuals with experience and/or exper tise relative to grazing management. Applicants should send curriculum vitae, transcripts, and description of rescarch interests, and have three letters of recommenda-tion forwarded by April 5, 1996 to: Dr. Ernest B. Fish, Search Committee Chairman, Department of Range, Wildlife, and Fisheries Management, Texas Tech University, Lubbock, TX 79409-2125. Telephone: 806-742-1983; FAX: 806-742-2280. Texas Tech is an Affirmative Action/Equal Opportunity Employer.

#### RESEARCH ONCOLOGIST

The Lombardi Cancer Center and the Department of Medicine at Georgetown University Medical Center invite applications for a research faculty position at the level of INSTRUCTOR in Medicine. Must be ABIM-certified and Board-certified/eligible in Medical Oncology, with demonstrated ability in basic research. Experience with immunohistochemistry, ELISA and PCR required. The successful candidate is expected to develop a translational research program with an emphasis on angiogenesis, growth factors and breast cancer. At least 80% of the appointee's time will be devoted to laboratory research. Submit a curriculum vitae and a detailed description of present and future research goals to: Marc Lippman, M.D., Director, Lombardi Cancer Center, 3970 Reservoir Road, NW, Suite 501, Washington, DC 20007

#### UCLA FACULTY POSITION UCLA-DOE Laboratory of Structural Biology and Molecular Medicine

The division of Structural Biology and Genetics of the UCLA-DOE Laboratory of Structural Biology and Molecular Medicine will appoint one faculty position at the level of ASSISTANT PROFESSOR or Assistant Professor in Residence, jointly with departments in the College of Letters and Science or the School of Medicine. We seek a computational biochemist with an interest in genome analysis. Truly exceptional candidates in related areas will also be considered. Set up and research funds will come from the UCLA-DOE Lab. Candidates must have significant research accomplishments, the ability to establish a vigorous research program, and a commitment to excellence in education. Applicants should provide a curriculum vitae, a summary of proposed research, copies of key publications or preprints, and three letters of recommendation by March 15, 1996 (extended deadline). Applications should be sent to

> Dr. David Eisenberg Chair of Search Committee UCLA-DOE Laboratory UCLA, Box 951570 Los Angeles, CA 90095-1570 FAX: 310-206-3914

UCLA is an Equal Opportunity Employer and encourages applications from women and minority candidates.

# ASSISTANT PROFESSOR IN TOXICOLOGY UNIVERSITY OF WASHINGTON

The Department of Environmental Health at the University of Washington in Seattle is seeking an outstanding junior investigator to occupy a regular faculty position supported by funds from the **Sheldon** D. Murphy Endowed Chair in Toxicology and Environmental Health. Requirements include a Ph.D. or equivalent degree, at least two years of postdoctoral experience and a productive record of quality research. Responsibilities include development of an independent externally funded research program, teaching at the graduate level and mentoring of M.S. and Ph.D. graduate students in Toxicology. Applicants must use state-of-the-art approaches to address problems of environmental toxicology as they apply to human health. Candidates working in the area of immunotoxicology and/or molecular biomarkers are particularly encouraged, but all specialty areas will be considered. Areas of emphasis of faculty include molecular toxicology of biotransformation enzymes, neuro-and behavioral toxicology, reproductive, developmental and respiratory toxicology, mechanisms of cell injury and molecular epidemiology. Involvement in our NIEHS Center for Ecogenetics and Environmental Health will be welcomed.

Please send two copies of a curriculum vitae, a brief summary of research plans and the names of three references to: Dr. Lucio G. Costa, Chair, Toxicology Search Committee, Department of Environmental Health, 4225 Roosevelt #100, University of Washington, Seattle, WA 98105. Information on the department can be found at http://www.sphcm.washington.edu. Applications will be received until April 19, 1996.

The University of Washington is committed to a culturally diverse faculty and strongly encourages applications from female and minority candidates. AA/EOE

# VASCULAR BIOCHEMISTS

Merck Research Laboratories in West Point, Pennsylvania, a world leader in biological and pharmaceutical research, has two openings for a Vascular Molecular Biologist and a Vascular Biochemist in the department of Pharmacology, working on the control of vascular growth.

The first position requires expertise in molecular biological techniques such as gene cloning, PCR as well as experience in the expression of recombinant eukaryotic proteins. The second position requires a strong background in the purification of proteins and enzymology. Experience in tyrosine kinase receptor biology is desired.

A BS/MS degree or the equivalent in Molecular Biology, Biochemistry or related field with a minimum of two years research experience is required. The successful candidates must be able to work independently as well as in a team environment and possess good communication skills.

Excellent salary and benefit programs accompany this position at our modern research facilities located 25 miles northwest of Philadelphia. Please send curriculum vitae with cover letter to: Personnel Manager, Ad#B-46, MRL Human Resources, WP42-2, Merck Research Laboratories, P.O. Box 4, West Point, PA 19486. EEO/AA/V/Employer.



# MASTER SCIENCE EDUCATOR

The New School for Social Research is seeking a Master Science Educator to assist in developing curriculum and programs in the sciences for its Undergraduate and Graduate divisions.

Reporting to the Dean of Undergraduate Liberal Studies, you will teach three classes per year, co-chair the Committee on Science and Technology and develop a science lecture series. Other responsibilities will include assisting Undergraduate Divisions in creating a science curriculum for non-science majors, researching and creating computer-assisted resources for use in science education and developing collaborative relationships with other institutions. 3-year renewable position.

To qualify, you must have a specialization in science and teaching experience or interest in working with non-science majors.

Send letter of application, curriculum vitae and three references by **March 15**, **1996** to: Mr. Amos Himmelstein, Dean's Office, **EUGENE LANG COLLEGE**, 65 West 11th Street, New York, NY 10011. Affirmative action/equal opportunity employer.



# genzyme

### Framingham Location STAFF SCIENTIST

Position will involve studying cellular and humoral immune responses against adenovirus vectors being developed for the gene therapy of cystic fibrosis. Emphasis will be on the study of the cytotoxic T lymphocyte (CTL) response against virus vectors in animal models and in an in vitro human system.

Ph.D. and 2-3 years of post-doctoral training in the field of cellular immunology required. Experience with cytotoxic T lymphocyte assays is highly desirable. (Code: PK1)

## SENIOR SCIENTIST - CELL AND ANIMAL PHYSIOLOGY

Opportunity to lead our research efforts in the evaluation of bioactivities of transforming growth factor-beta in relevant preclinical models of certain human diseases. The job will involve planning and execution of experiments that will guide the clinical development of this cytokine. We seek a Ph.D. in Cell Biology, Animal Physiology or related field with at least 6 years' experience in cytokine biology. Experience with preclinical model development and preclinical testing of therapeutic proteins is essential. Strong publication record is required. (Code: PK2)

#### **DIRECTOR, ANIMAL PHYSIOLOGY LAB**

Manage the preclinical testing facilities, including support functions such as the histology and pharmacokinetic sections. Also develop and/or implement preclinical models of cartilage repair to support our Carticel R&D program. We seek a DVM or Ph.D. in Animal Physiology or related field with at least 10 years in preclinical animal safety and efficacy testing of medical products. Specific experience in orthopedic research is essential. (Code: PK3)

Genzyme rewards success with an excellent compensation and benefits package, including 3 weeks' paid vacation, a 401(k) plan with a company match, extensive insurance benefits and an Employee Stock Purchase plan. Send resumes, indicating job code, to: Genzyme Corporation, Pam Kurtzer, Human Resources Department, One Mountain Road, Framingham, MA 01701-9322. Phone: (508) 872-8400. Fax: (508) 872-5234. An equal opportunity employer.

ADVANCING HEALTHCARE PRODUCTS AND SERVICES WORLDWIDE

#### BIOLOGICAL AND ENVIRONMENTAL SCIENCES

Invertebrate Ecologist. Applicants should be seeking a career at a primarily teaching institution and should be prepared to teach a variety of courses at both the undergraduate and graduate level. An active research program involving both undergraduates and M.A. level graduate students is expected. TENURE-TRACK position with rank and salary dependent upon qualifications. Ph.D. is required. Preference will be given to candidates who have a strong background in aquatic ecology and field studies as well as demonstrated excellence in teaching. Screening will begin inmediately and continue until position is filled. Send letter of application, current curriculum vitae or résumé, three letters of recommendation, and transcripts to: Dr. Jean Kreizinger, Biological and Environmental Sciences, Western Connecticut State University, 181 White Street, Danbury, CT 06810. Affirmative Action/Equal Employment Opportunity Employer.

#### HENDRIX COLLEGE Visiting Assistant Professor of Biology

Hendrix College is accepting applications for a oneyear sabbatical replacement to teach the following courses: Genetics (two sections with laboratories), Cell Biology (introductory level two sections), Molecular Genetics (with laboratory) and a non-majors Concepts in Biology course. These six courses will be taught over a trimester calendar with one laboratory course each term. Applicants should send transcripts, curriculum vitae, three letters of reference that emphasize teaching skills, and a letter of application to: Mark Sutherland, Hendrix College, 1601 Harkrider, Conway, AR 72032. Telephone: 501-450-1217. Email: sutherlandmv@hendrix.edu. Hendrix, a residential liberal arts college of approximately 1000, is situated in Conway, Arkansas, thirty miles from Little Rock. Hendrix is a member of the Associated Colleges of the South and adheres to the principle of Equal Education and Employment Opportunity.

#### **POSITIONS OPEN**

#### CASTLETON STATE COLLEGE Biology Faculty Vacancy January 1997

Castleton State College (CSC) seeks applications for a TENURE-TRACK POSITION in biology to begin January 1997. Applicants must have a Ph.D. in the biological sciences (or ABD with completion by January 1997) and be committed to undergraduate education. The position involves teaching introductory-level zoology and upper-level courses in ecology, vertebrate and/or invertebrate zoology, and in the candidate's area of interest. Because the science department is small, the successful candidate must be able to teach general education students in introductory classes as well as dedicated majors in smaller upper-level classes. Castleton has placed a special value on the teaching roles of its faculty, and candidates for this position will be evaluated principally on the basis of their potential to be outstanding teachers. Strong interpersonal skills and the ability to work collaboratively with colleagues are also essential. Rank and salary is dependent on qualifications and experience. Castleton is a small, liberal arts college located in the lakes region of western Vermont. Review of applications will begin April 1, 1996 and continue until the position is filled. Send résumé, three letters of recommendation, and a statement of interest to: Dr. Joseph T. Mark, Academic Dean, Castleton State College, Castleton, VT 05735.

CSC is an Equal Opportunity/Affirmative Action Employer.

POSTDOCTORAL POSITION available April 1996 to join a research team working on molecular approaches to study breast cancer. Experience in biochemistry or molecular biology required. Salary commensurate with qualifications and experience. Excellent fringe benefits. Send curriculum vitae, a brief summary of research interests, and three letters of reference to: Dr. Beatriz G.-T. Pogo, Box 1131, Mount Sinai School of Medicine, One Gustave L. Levy Place, New York, NY 10029-6574. An Equal Opportunity Employer.

#### **POSITIONS OPEN**

#### UNIVERSITY OF MICHIGAN

A **POSTDOCTORAL POSITION** is available immediately in an exciting research environment to investigate signal transduction and mechanisms of DNA excision repair in the context of autoimmunity. Experience in signal transduction and recombinant DNA technology is required.

Send curriculum vitae and names of three references to: Dr. Joseph Holoshitz, Director, University of Michigan Specialized Center of Research in Rheumatoid Arthritis, 200 Zina Pitcher Place, Kresge I R4550, Ann Arbor, MI 48109-0531.

#### HARVARD MEDICAL SCHOOL

POSTDOCTORAL POSITION—Fully funded position is currently available to study human retrovirology with particular focus on gene therapy of HIV. Ph.D. and/or M.D. with an expertise in cell biology/molecular biology and virology preferred. Please submit curriculum vitae and three references to: Bin Du, M.D. and Jerome E. Groopman, M.D., Division of Hematology/Oncology, Harvard Medical School, New England Deaconess Hospital, One Deaconess Road, Boston, MA 02215. FAX: 617-632-0193.

#### UNIVERSITY OF VIRGINIA Genetic Engineering Targeting Vascular Disease

This new program in the Department of Biomedical Engineering invites applications for a tenure-track ASSISTANT/ASSOCIATE PROFESSOR position with expertise in genetic engineering (molecular genetics or vascular transfection technology). Demonstrated research experience and existing (associate) or potential for (assistant) strong extramural research support expected. Please submit résumé including research plans and three references to: Dr. Klaus Ley, Department of Biomedical Engineering, HSC Box 377, University of Virginia, Charlottesville, VA 22908. The University is an Equal Opportunity Employer. Women and minorities are encouraged to apply.

Wanted: Committed, ambitious scientist. Must be a team player with a vision for the future. M.D./Ph.D., Ph.D., M.S. or B.S. degree necessary.

### Does this describe you?

If it does, then plan to attend the bioSCIENCE Career Fairs sponsored by SCIENCE. The bioSCIENCE Career Fairs offer the perfect opportunity for scientific professionals to meet in person with representatives from top biotechnology and pharmaceutical companies, universities, governmental agencies and institutions. You can also attend the seminar, How to get a paper published in SCIENCE. This exclusive seminar is offered free of charge and will be conducted by one of SCIENCE's editors.

#### 1996 bioSCIENCE Career Fairs

Cambridge, MA on the MIT Campus. March 1: 11 am - 4pm; March 1 Seminar: 11 am - 11:30 am. March 2: 12 pm - 4 pm.

San Francisco, CA on the Stanford Campus in Palo Alto, May 3-4.

La Jolla, CA at the Scripps Research Institute, October 4-5.

To pre-register, please submit your resume or CV via fax: (202) 289-6742, or via e-mail: bioscience@aaas.org.



For more information please call (202) 326-7018.

bioSCIENCE Career Fair Information On-Line: http://www.aaas.org (Choose SCIENCE Classified Advertising from the menu)

#### DEPARTMENT OF ENERGY Human Genome Program Announcement Ethical, Legal, and Social Implications

Energy Research Financial Assistance Program Notice 96-09: Human Genome Program - Ethical, Legal, and Social Implications

ACTION: Notice inviting grant applications.

SUMMARY: The Office of Health and Environmental Research (OHER) of the Office of Energy Research (ER), U.S. Department of Energy, hereby announces its interest in receiving applications in support of the Ethical, Legal, and Social Implications (ELSI) subprogram of the Human Genome Program (HGP). This program is a coordinated, multidisciplinary, directed research effort aimed at obtaining a detailed understanding of the human genome at the molecular level. This particular research notice encompasses research grants that address ethical, legal, and social issues that may arise from the use of information and knowledge resulting from the HGP.

**DATES:** Potential applicants are strongly encouraged to submit a brief preapplication. All preapplications, referencing Program Notice 96-09, should be received by DOE by 4:30 P.M. E.S.T., March 28, 1996. A response discussing the potential program relevance of a formal application generally will be communicated to the applicant within 30 days of receipt. The deadline for receipt of formal applications submitted in response to this notice must be received by 4:30 P.M., E.D.T., July 11, 1996, to be accepted for merit review in September 1996 and to permit timely consideration for award in fiscal year 1997.

ADDRESSES: Preapplications referencing Program Notice 96-09 should be sent to Dr. Daniel W. Drell, U.S. Department of Energy, Office of Health and Environmental Research, ER-72, 19901 Germantown Road, Germantown, MD 20874-1290.

After receiving notification from DOE concerning successful preapplications, applicants may prepare formal applications and send them to: U.S. Department of Energy, Office of Energy Research, Grants and Contracts Division, ER-64, 19901 Germantown Road, Germantown, MD, 20874-1290, ATTN: Program Notice 96-09. The above address for formal applications also must be used when submitting formal applications by U.S. Postal Service Express Mail, and commercial mail delivery service, or when handcarried by the applicant.

FOR FURTHER INFORMATION CONTACT: Dr. Daniel W. Drell, U.S. Department of Energy, Office of Health and Environmental Research, ER-72, 19901 Germantown Road, Germantown, MD 20874-1290, by telephone (301) 903-6488, by FAX (301) 903-8521, or preferably by Email, joanne.corcoran@oer.doe.gov.

SUPPLEMENTARY INFORMATION: The DOE encourages the submission of applications to conduct research on privacy and confidentiality issues from the creation, use, maintenance, and disclosure of genetic information. This may include (but is not limited to) issues of ownership, commercialization, and control of genetic information, and the protection of the privacy of genetic information in various settings, including the workplace. Applications should demonstrate knowledge of the relevant literature and should include detailed plans for the gathering and analysis of factual information and the associated ethical, legal, and social implications. All applications should include, where appropriate, detailed discussion of human subjects protection issues, e.g., storage of , manipulation of, and access to data. Provisions to ensure the inclusion of women, minorities, and potentially disabled individuals must be described, unless specific exclusions are scientifically necessary and justified in detail. All proposed research applications should address the issue of efficient dissemination of results to the widest appropriate audience. All applications involving collaborations should include letters of support from the potential collaborators; these letters should specify the contributions the collaborator intends to make if the application is accepted and funded.

The DOE also solicits applications for the preparation and dissemination of educational materials in any appropriate medium that will enhance understanding of scientific, as well as the ethical, legal, and social aspects of the HGP among public or specified groups. If an educational effort for a specific group is proposed, the value to the HGP of that group or community should be explained in detail. In addition, the DOE encourages applications for the support of conferences focusing on the ethical, legal, and social implications of the HGP. Issues to be examined may include (but are not limited to) implications of advances in the genetic characterization of complex traits (e.g., disease predisposition or susceptibility genes) and the impacts of advances in knowledge about polygenic conditions for various communities potentially faced with these impacts (e.g., courts, schools, etc.).

Educational and conference applications should demonstrate awareness of the relevant literature and include detailed plans for the accomplishment of project goals. In applications that propose the production of series for broadcast, audio-visuals, or other educational materials, the DOE requests that samples of previous similar work by the producers and writers be submitted along with the application. In applications for the support educational activities, the DOE requests inclusion of a plan for assessment of the effectiveness of the proposed activities. For conference applications, a detailed and largely complete roster of speakers is necessary. At the completion of the conference, a summary or report is required. Educational and conference applications must also demonstrate awareness of the need to reach the widest appropriate audience.

Ordinarily, DOE does not encourage applications dealing with issues consequent to genetic testing protocols. Additionally, DOE does not encourage survey-based research, unless a compelling case is made that this methodology is critical to address an issue of uncommon significance. For applications that propose the development of college-level curricula, DOE requests detailed justification of the need for external support beyond normal departmental and college resources, evidence of commitment from the parent department or college, and a dissemination plan. Applications for the writing of scholarly publications or books should include justifications for the relevance of the publications or books to the goals of the HGP as well as discussion of the estimated readership and impact. DOE ordinarily will not provide unlimited support for a funded program and, thus, strongly encourages the inclusion of plans for transition to self-sustaining status.

The brief preapplication, in accordance with 10 CFR 600. 10(d)(2), should consist of two to three pages of narrative describing the research project objectives and methods of accomplishment. The preapplications will be reviewed for relevance to the notice, and further instructions will be provided with the response. Preapplications determined by staff of the Office of Health and Environmental Research to be insufficiently directed at the goals of the notice will be returned without further review to the applicant. Telephone and facsimile numbers are required parts of the preapplication, and electronic mail addresses are desirable.

It is anticipated that approximately \$1,300,000 will be available for grant awards in this area during FY 1997, contingent upon availability of appropriated funds. Multiple year funding of grant awards is expected, and is also contingent upon availability of funds. Previous awards have ranged from \$50,000 per year up to \$500,000 per year with terms from 1 to 3 years; most awards average about \$200,000 per year for 2 of 3 years. Similar award sizes are anticipated for new grants.

Information about development and submission of applications, eligibility, limitations, evaluation, selection process, and other policies and procedures may be found in 10 CFR Part 605, and in the Application Guide for the Office of Energy Research Financial Assistance Program. The Application Guide is available from the U.S. Department of Energy, Office of Health and Environmental Research, Health Effects and Life Sciences Research Division, ER-72, 19901 Germantown Road, Germantown, MD 20874-1290. Telephone requests may be made by calling (301) 903-6488. Internet requests can be made to: joanne.corcoran@oer.doe.gov Electronic access to ER's Financial Assistance Guide is possible via the Internet using the following E-Mail address: http://www.er.doe.gov

The Office of Energy Research, as part of its grant regulations, requires at 10 CFR 605.1 I (b) that a grantee funded by ER and performing research involving recombinant DNA molecules and/or organisms and viruses containing recombinant DNA molecules shall comply with the National Institutes of Health "Guidelines for Research Involving Recombinant DNA Molecules" (59 FR 34496, July 5, 1994.), or such later revision of those guidelines as may be published in the Federal Register.

The dissemination of materials and research data in a timely manner is essential for progress toward the goals of the DOE HGP. The OHER requires the timely sharing of resources and data. Applicants should, in their applications, discuss their plans for disseminating research results and materials that may include, where appropriate, publication in the open literature, wide-scale mailings, etc. Once OHER and the applicant have agreed upon a distribution plan, it will become part of the award conditions. Funds to defray the costs of disseminating results and materials are allowable; however, such requests must be sufficiently detailed and adequately justified. Applicants should also provide timelines projecting progress toward achieving proposed goals.

The Catalog of Federal Domestic Assistance Number for this program is 81.049, and the solicitation control number is ERFAP 10 CFR part 605.

**FROM:** Federal Register, Wednesday, February 7, 1996, Vol. 61, No. 26, pages 4631-4633, "Energy Research Financial Assistance Program Notice 96-09: Human Genome Program – Ethical, Legal, and Social Implications"

Vascular biologist, Ph.D. A position opening at the POSTDOCTORAL/INSTRUCTOR level is available for a qualified vascular biologist with a Ph.D. in molecular biology, physiology, pharmacology. Join a multidisciplinary, inter-institutional research team exploring the interrelationship of neuronal innervation, signal transduction, and intercellular communication to the initiation, maintenance, and modulation of vascular tissue responses. Funding guaranteed for three years. Send a letter of career research interests, curriculum vitae, and three letters of recommendation to: Dr. George J. Christ, Associate Professor, Room 716S Forchheimer Building, Albert Einstein College of Medicine, 1300 Morris Park Avenue, Bronx, NY 10461. Equal Opportunity Employer.

A POSTDOCTORAL POSITION in the Department of Medicine, University of Cambridge School of Medicine, is available beginning in spring/summer 1996. This position involves the study of membrane proteins that mediate the activation of lymphocytes. Candidates must have experience in protein chemistry, molecular biology, and functional analysis of B lymphocyte membrane proteins. Applicants should submit a curriculum vitae, a description of research interests, and two letters of recommendation to: Ms. Carol Bowen, School of Clinical Medicine, Hills Road, Cambridge CB2 2SP England. Closing date for receipt of applications is 8 March 1996.

POSTDOCTORAL POSITION available in an exciting, NIH-funded pulmonary research lab investigating pulmonary infections (especially, M. tuberculosis and P. carinii). Studies involve adherence/phagocytosis mechanisms, host response, and therapeutic strategies. "Hands on" experience in molecular biology, microbiology, and/or immunology preferred. Experience with aerosol technology a real plus. Competitive salary and fringe benefits offered. Please provide curriculum vitae and three references to: W. J. Martin II, M.D., Indiana University, 425 WD OPW, 1001 West 10th Street, Indianapolis, IN 46202.

A SENIOR RESEARCH ASSOCIATE position and RESEARCH SCHOLAR position available immediately to study molecular mechanism of tumorigenesis, involving tumor suppressor genes and oncogenes. Very competitive salary depending on experience. Please send curriculum vitae with names and telephone numbers of three references to: Yuen Kai Fung, Ph.D., Associate Professor, University of Southern California, Childrens Hospital Los Angeles, 4650 Sunset Boulevard, Mailstop 94, Los Angeles, CA 90027. Equal Employment Opportunity/Affirmative Action.

#### POSTDOCTORAL POSITIONS

Three to four POSTDOCTORAL FELLOW positions are available to study CNS regeneration, neural transplantation, and neurodegenerative disease. Specifically, studies are underway investigating neural transplants and trophic factors in rodent and nonhuman primate models of neurodegenerative disease. Studies are also underway investigating the status of neurotrophins and their receptors in human development and neurodegenerative disease. Candidates should have expertise in neuroanatomy, molecular biology, or behavior. Positions are for two to three years and salary is commensurate with experience. Send curriculum vitae and names of references to: Drs. Jeffrey H. Kordower and Elliott J. Mufson, Department of Neurological Sciences and Research Center for Brain Repair, Rush Presbyterian Medical Center, 2242 West Harrison Street, Chicago, IL 60612. Email: jkordowe@Rush.RPSLMC.edu.

#### POSTDOCTORAL FELLOWSHIP IMMUNOLOGY AND INFECTIOUS DISEASES

A position is available immediately for a Ph.D. or M.D. to investigate mechanisms of host resistance against opportunistic pathogens and development of new diagnostic methods. Project includes study of role of cellular immunity and cytokines. Appropriate prior experience in immunology/molecular biology/cell biology preferred. Send curriculum vitae and three references to: Dr. Yasuhiro Suzuki, Research Institute, Palo Alto Medical Foundation, 860 Bryant Street, Palo Alto, CA 94301.

#### **POSITIONS OPEN**

#### **IMMUNOLOGY**

POSTDOCTORAL POSITION. Antigen processing and presentation of polysaccharide-protein conjugate vaccines are being investigated. Experience in working with cell fractionation and lysosomes/endosomes or other relevant experience is desirable. Applicants must have less than five years of postdoctoral experience and must be U.S. citizens or permanent residents. Kathryn E. Stein, Ph.D., Laboratory of Molecular and Developmental Immunology, CBER/FDA (HFM-555), 1401 Rockville Pike, Rockville, MD 20852-1448. FAX: 301-827-0852.

#### POSTDOCTORAL POSITION

Available to continue studies on the diphtheria toxin receptor which this laboratory has cloned and shown to be identical to the precursor of a growth factor, HB-EGF [see Cell, 69:1051–1061, 1992]. The position entails investigating the expression and processing of the receptor, interactions between the receptor and other proteins, intercellular signaling mediated by the receptor, etc. Candidate should have training in biochemistry, molecular biology, or microbiology. Send curriculum vitae and names of three references to: Dr. Leon Eidels, Department of Microbiology, The University of Texas (UT) Southwestern Medical Center, 5323 Harry Hines Boulevard, Dallas, TX 75235-9048. UT Southwestern is an Equal Opportunity Institution.

#### POSTDOCTORAL FELLOWSHIPS

POSTDOCTORAL FELLOWSHIPS in gastroenterological research available for two or more years beginning in 1996. Faculty employs multidisciplinary approach using biochemical, cell/molecular biological, immunological, physiological and electrophysiological techniques. Applicant may focus on clinical and/or basic studies. Applicants should have M.D. or Ph.D. degree and must be U.S. citizens or have permanent visa status. Send curriculum vitae and names of three references to: N. F. LaRusso, M.D., Program Director, NIH Training Grant, Mayo Clinic, Rochester, MN 55905.

Mayo Foundation is an Affirmative Action/Equal Opportunity Educator and Employer.

POSTDOCTORAL POSITION available immediately for Ph.D. in molecular biology, genetics, or biochemistry to define the role of protein kinase C and retinoic acid nuclear receptors in transcriptional regulation using transgenic and knock-out mouse models. Strong background in molecular genetics/gene cloning, genetic analysis is required. Send curriculum vitae and three references to: Dr. A. K. Verma, Professor, Human Oncology, University of Wisconsin, K4/532 CSC, 600 Highland Avenue, Madison, WI 53792. FAX: 608-262-6654.

#### POSTDOCTORAL POSITION Plant Molecular Biologist

To study molecular genetic regulation of development in the fern Ceratopteris. Experience in library construction and screening, in situ hybridization, and light microscopy/image analysis highly desirable. Additional collaborative opportunities are possible with other faculty studying gene expression control. Send letter of application, curriculum vitae, and three reference letters to: Dr. Jeff Hill, Department of Biological Sciences, Box 8007, Idaho State University, Pocatello, ID 83209-8007. Email: hilljeff@fs.isu.edu. Idaho State University is an Equal Opportunity/Affinnative Action Employer.

POSTDOCTORAL POSITION in Developmental Biology available immediately to study skeletal muscle myoblast differentiation and fiber type development. Research employs cell culture, cell transplantation, immunocytochemistry, and molecular biology to examine myogenic cell commitment, proliferation, and differentiation. Experience in cell culture and molecular biology is preferred. Send curriculum vitae, a brief statement of research interests, and three letters of recommendation to: Dr. Joseph X. DiMario, Department of Cell Biology and Anatomy, FUHS/The Chicago Medical School, 3333 Green Bay Road, North Chicago, IL 60064. Equal Opportunity Employer.

#### **POSITIONS OPEN**

RESEARCH FELLOWSHIP in the Department of Ophthalmology in immunopathogenesis. The successful candidate will have a Ph.D. or M.D. and demonstrated skill in basic virological research with experience in expression vector biochemistry. The candidate will be responsible for expressing various recombinant enteroviral proteins and evaluating their immunoactivity. Send curriculum vitae and recent publications to: Marlyn P. Langford, Ph.D., Department of Ophthalmology, LSU Medical Center, 1501 Kings Highway/P.O. Box 33932, Shreveport, LA 71130. Deadline May 1, 1996, or until suitable candidate is identified. Equal Employment Opportunity/Affinative Action Employer.

RESEARCH ASSOCIATE position for a Ph.D. or M.D. to study mechanisms of cell shape changes and cytoskeleton organization in cultured cells. Experience with cell culture, gel electrophoresis, and molecular biology is necessary. Start date July 1996. Send curriculum vitae and the names of three references to: Dr. Jeffrey Kreisberg, Department of Pathology, UTHSCSA, 7703 Floyd Curl Drive, San Antonio, TX 78284-7750. The University of Texas Health Science Center is an Equal Employment Opportunity/Affirmative Action Employer.

Three POSTDOCTORAL POSITIONS (visiting, one-to-three years). Two molecular biologists to develop transgenic wetland plants with improved accumulation/volatilization of trace elements. One plant physiologist to study trace element uptake by wetland plants. Salary: \$27,000 to \$30,000. Send résumé and three letters of recommendation to: Prof. Norman Terry, Department of Plant Biology, 111 Koshland Hall, University of California, Berkeley, CA 94720-3102. Email: nterry@nature.berkeley.edu. Equal Opportunity Employer.

POSTDOCTORAL POSITION available immediately to investigate the role of complement and inflammatory responses in Alzheimer's disease. The project is colaborative and will include Drs. Andrea Tenner and Carl Cotman, and other investigators from the Institute for Brain Aging and Dementia. Candidates should have a Ph.D. in neuroscience, immunology, or a related field. Experience in biochemistry, protein/peptide chemistry, and/or cell biology is preferred. Must be a U.S. citizen or pernament resident. Interested candidates should send a curriculum vitae with either letters or the names and addresses of three references to: Andrea J. Tenner, Ph.D., Department of Molecular Biology and Biochemistry, University of California, Irvine, CA 92717-3900. University of California, Irvine, an Equal Opportunity Employer committed to excellence through diversity.

POSTDOCTORAL POSITION available for the structure-function analysis of the Kss1 MAP kinase in yeast. This work entails state-of-the-art molecular and cellular biological techniques, including site-directed mutagenesis, immunocytochemistry, and purification and biochemical assay of the mutant kinases. Send a curriculum vitae, description of research experience, and the names, addresses, and telephone numbers of three references to: William Courchesne, School of Medicine, 320, University of Nevada, Reno, NV 89557. Review of applicants will begin February 20, 1996. Affimative Action/Equal Opportunity Employer.

POSTDOCTORAL POSITIONS available immediately to investigate structure-function relationships underlying macromolecular assemblies involved in transcription. Projects include X-ray crystallographic studies of RNA polymerase components, and three-dimensional reconstruction of RNA polymerase and transcription complexes from helical crystals by cryoelectron microscopy and image processing. Send curriculum vitae and the names of three references to: Dr. Seth Darst, The Rockefeller University, Box 224, 1230 York Avenue, New York, NY 10021. FAX: 212-327-7477; Email: darst@rookvax.rockefeller.edu.

POSTDOCTORAL POSITION to study GTPase-activating proteins (GAPs) for heterotrimeric G proteins: identification of new GAPs, their mechanisms of action and signaling functions. Candidates should be experienced in either protein purification, enzymology or molecular cloning. Send curriculum vitae, brief statement of interests, and names of two to three referees to: Elliott M. Ross, Department of Pharmacology, University of Texas Southwestern Medical Center, 5323 Harry Hines Boulevard, Dallas, TX 75235-9041. Email: ross@utsw.swmed.edu. University of Texas Southwestern is an Equal Opportunity Institution.

#### SCIENTIFIC RESEARCH OPPORTUNITIES

Innovative research at Sandoz has been enhancing medicine around the world for over a century. Pioneering drugs have extended and improved the quality of life for countless individuals and revolutionized basic scientific concepts within the transplantation and mental health fields. Our developments are the result of research conducted by professionals who specialize in many different fields. We currently have openings for scientists in our Oncology and Metabolic Diseases Departments.

#### **ONCOLOGY**

The successful candidate will be responsible for the development of *in vivo* models of angiogenesis and metastasis as part of a large preclinical oncology research program. Responsibilities will include the testing of agents in these models to identify novel inhibitors of tumor angiogenesis. The candidate will also be responsible for performing pharmacological analyses and studies to characterize the selectivity and mechanism of action of these agents.

Candidates should have a Ph.D. or equivalent with about three to five additional years of relevant experience in the areas of tumor biology, tumor angiogenesis and *in vivo* modeling in cancer. Knowledge of tumor physiology and cancer pharmacology and hands-on experience with a variety of *in vivo* tumor models is required. Experience in the area of preclinical drug development would be an advantage.

(Position #3447)

#### **METABOLIC DISEASES**

This position requires an *in vivo* physiologist to run a pharmacology laboratory in metabolic disease research. The incumbent will supervise 2-4 scientists and take responsibility for drug discovery, preclinical development and basic research in carbohydrate and lipid metabolism. This will include working with a multidisciplinary team of scientists to profile development compounds, optimize *in vivo* modeling for metabolic diseases and identify new therapeutic targets.

A Ph.D. or equivalent with about three to five additional years of relevant experience in physiology, endocrinology, pharmacology or a related field and extensive knowledge of carbohydrate and lipid metabolism, and disorders thereof, are required. The chosen candidate must also have extensive experience with *in vivo* experimentation and data interpretation. Good communication skills and demonstration of creative scientific thinking as evidenced by relevant scientific publications are also required. (**Position #3320**)

Sandoz offers comprehensive health, dental and savings plans, as well as an attractive location in northern New Jersey. For consideration, please specify the number of the position you are responding to and forward your curriculum vitæ and the names and addresses of three references to:

#### SANDOZ PHARMACEUTICALS CORP

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East Hanover, NJ 07936
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bringing research to life

The Bristol-Myers Squibb Company Pharmaceutical Research Institute in Syracuse, New York, is seeking two Ph.D. Senior Research Investigators working in Pharmaceutical Development.



### Bristol-Myers Squibb

#### Research Investigators Pharmaceutical Development

One of the positions is responsible for managing a group that implements, optimizes, and validates in vitro molecular and immunological techniques used to characterize natural and recombinant protein products. Requirements are a Ph.D. in Cell and Molecular Biochemistry with proven experience in Molecular Biology, Immunology and Bioanalytical Techniques (e.g., in cell transfections, reporter cell lines, hybridoma technology, immunoassays). Experience in instrument automation and computer science is desired. Candidates must have the ability to lead a team of 4-6 scientists. Job #SY950033.

The second position is to supervise and direct a multi-disciplinary team of scientists in Physical Biochemistry charged with characterizing physical properties of biological products. The laboratory will develop new methods to analyze protein structures, carbohydrates, and modified amino acids. Proven experience in bioanalytical techniques (e.g., peptide mapping/sequencing, chromatography, and spectroscopy) is required. Candidate must maintain an awareness of current literature, recommend and implement new technology. Must have demonstrated ability for independent experimental design, interpretation, and report writing. Requirements for this position are a Ph.D. with 4-8 years of experience managing a protein characterization group. Job #SYR95052.

We offer excellent salary and comprehensive benefits. For consideration, forward your resume with salary requirements and job number to: Manager, Human Resources, Bristol-Myers Squibb Pharmaceutical Research Institute, P.O. Box 4755, Syracuse, NY 13221-4755.

Equal Opportunity Employer, M/F/D/V

#### MOLECULAR IMMUNOLOGY

#### Postdoctoral Scientist

SmithKline Beecham, a world leader in pharmaceutical research, has an immediate opening for a Postdoctoral Scientist to join our multidisciplinary research group in the area of molecular immunology.

The selected individual would be responsible for designing and executing experiments using recombinant antibody technology, with an initial focus on novel surface antigens on subsets of hematopoietic and lymphoid cells. Expectations would also include significant interaction with other staff in discussion and interpretation of results and strategies, as well as presentation of results in departmental seminars and external meetings and publications.

The successful candidate will have a PhD in Molecular Biology, Immunology or closely related discipline, along with practical experience in recombinant DNA technology, a background in immunology, and a strong record of scientific publication. Use of radioactive reagents at moderate levels will be necessary.

Located in our state-of-the-art research facility in suburban Philadelphia, SmithKline Beecham offers a competitive compensation/benefits/relocation package. For confidential consideration, please forward resume and salary requirements to: SmithKline Beecham Pharmaceuticals, Job Code H5-0066, P.O. Box 2646, Bala Cynwyd, PA 19004. We are an Equal Opportunity Employer, M/F/D/V.

SmithKline Beecham
Pharmaceuticals

Challenging the natural limits.

#### POSTDOCTORAL POSITION Harvard Medical School

NIH-funded position available now to study effects of ethanol on L1 cell adhesion molecule (CAM) and regulation of neural IgCAMs by bone morphogenetic procins. Require experience in molecular biology and primary neuronal culture. Prefer permanent U.S. resident. Send curriculum vitae, three references to: Dr. M. E. Charness, Department of Neurology (127), Harvard Medical School, 1400 VFW Parkway, West Roxbury, MA 02132. Email: mcharn@harvarda.harvard.edu. Affirmative Action/Equal Opportunity Employer.

#### POSTDOCTORAL POSITION University of Pittsburgh Medical Center

Position available January 1997 in the Division of Cardiology to study the molecular, cellular, and electrophysiological determinants of cardiac arrhythmias using transgenic and knockout technology in the mouse. Extensive prior experience with myocyte cellular physiology, fluorescent intracellular calcium measurement, or patch clamp techniques is required. Send curriculum vitae and names of three references to: Attention: Mary Beth Bawden, Division of Cardiology, University of Pittsburgh Medical Center, Fifth Floor Scaife Hall, 200 Lothrop Street, Pittsburgh, PA 15213.

#### POSTDOCTORAL POSITION

The Henry M. Jackson Foundation for the Advancement of Military Medicine is seeking to hire an individual to work in the laboratory of Stefanie N. Vogel, Ph.D., Department of Microbiology and Immunology, Uniformed Services University of the Health Sciences. POSTDOCTORAL position available immediately for an NIH sponsored study of the role of intracellular signaling pathways in endotoxin (LPS)-stimulated macrophages. Experience in molecular biology and/or biochemistry preferable. Salary is commensurate with experience. Send letters of application, curriculum vitae, and names of three references to: Human Resources, Attention: PL 2960032, Henry M. Jackson Foundation for the Advancement of Military Medicine, 1401 Rockville Pike, Suite 600, Rockville, MD 20852. Affirmative Action/Equal Opportunity Employer.

#### POSTDOCTORAL POSITION

Position available at the Weis Center for Research in Danville, Pennsylvania in the laboratory of **Dr. William Maltese**. Studies focus on structure-function analysis of Rab GTP-binding proteins and the roles of specific Rab proteins in intracellular trafficking of Alzheimer's amyloid precursor protein. The Weis Center is a well-equipped, modern research facility in an attractive rural environment. Starting date is flexible and salary depends on experience. Ph.D. in protein biochemistry, cell biology, or molecular biology is preferred. Please send curriculum vitae with the names and telephone numbers of three references to: **Geisinger Human Resources (WAM)**, **100 North Academy Avenue, Danville, PA 17822-1529.** Equal Opportunity Employer. Minorities/Females/Disabled/Veterans.

POSTDOCTORAL POSITION available immediately to study structure/function relationships in mRNA binding poteins. Applicants should have experience in one or more of the following areas: molecular biology, including protein expression; fluorescence; circular dichroism; measurement of protein:nucleic acid binding affinities; protein chemistry; oligonucleotide purification; other areas of biophysics. Applicants should send curriculum vitae and the names of three references to: Dr. Kenneth R. Williams, Department of Molecular Biophysics and Biochemistry, Yale University School of Medicine, 333 Cedar Street, New Haven, CT 06520-8024. Yale University is an Equal Opportunity Employer.

#### POSTDOCTORAL POSITION

Available immediately for microsatellite marker development and analysis in loblolly pine. The two-year project involves the USDA Forest Service and International Paper Co. and augments an established SSR marker program. Molecular biology experience and strong interests in genetic research are required. Send résumé and names of references by March 15, 1996 to: Dr. Craig S. Echt, North Central Forest Experiment Station, 5985 County Road K, Rhinelander, WI 54501 USA. Telephone: 715-362-1114; Email: cecht@newnorth.net.

#### **POSITIONS OPEN**

#### BIOCHEMISTRY POSTDOCTORAL OPPORTUNITIES

Oak Ridge National Laboratory (ORNL), located in lak Ridge, Tennessee, has several POSTDOCTORAL Oak Ridge, Tennessee, has several POSTDOCTORAL POSITIONS available in the Chemical and Analytical Sciences Division for R&D to work on "Laboratory-ona-Chip" technologies which are focused on the development of miniaturized devices that can perform chemical and biochemical procedures. Biochemical materials of interest include nucleic acids and enzymes. Applicants should have an interest in technological developments related to the acquisition of biochemical information. Outstanding candidates with experience in biochemical assays and appropriate Ph.D. training should send a curriculum vitae, three letters of recommendation, and copies of graduate and undergraduate transcripts to: Dr. J. Michael Ramsey, Oak Ridge National Laboratory, Department of SCI-0226, P.O. Box 2008, Oak Ridge, TN 37831-6142. ORNL is a multipurpose research facility managed by Lockheed Martin Energy Research Corporation for the U.S. Department of Energy. An Equal Opportunity Employer Committed to building and maintaining a diverse workforce.

POSTDOCTORAL POSITIONS available at New England Medical Center supported by an NIH training grant in Gastroenterology. Projects include structure/function studies of cloned CCK/gastrin receptors, analysis of knockout mouse models (A. S. Kopin); transcriptional control of intestinal/pancreatic endocrine differentiation, and endocrine cell lineage analysis in transgenic mice (A. B. Leiter). Molecular biology background essential. Must be U.S. citizen or permanent resident. Send curriculum vitae to: Dr. A. Kopin, New England Medical Center, Division of Gastroenterology, NEMC 239, 750 Washington Street, Boston, MA 02111. New England Medical Center is an Equal Opportunity Employer. Applications from women and minorities are encouraged.

#### POSTDOCTORAL POSITION Cellular and Molecular Tumor Immunology

To study cellular immune mechanisms in molecular and gene therapy approaches to cancer immunotherapy in animal systems and in human translational research, available July 1996. Applicants must possess a Ph.D. and demonstrated experience in cellular immunology. Send curriculum vitae and arrange for three letters of recommendation to be sent to: Jonathan J. Lewis, M.D., Ph.D., Immunology Program, Box 126, Memorial Sloan-Kettering Cancer Center, 1275 York Avenue, New York, NY 10021. FAX: 212-794-5847. Memorial Sloan-Kettering Cancer Center is an Equal Opportunity Employer.

POSTDOCTORAL POSITION available immediately to study novel molecular targets of cocaine and morphine identified through subtraction hybridization and serial analysis of gene expression. A strong background in molecular biology and the ability to pilot new techniques is desirable. Send curriculum vitae and the names of three references to: Dr. Kevin A. Sevarino, Division of Molecular Psychiatry, Department of Psychiatry, Yale University School of Medicine, 34 Park Street, Room 309, New Haven, CT 06508. Affirmative Action/Equal Opportunity Employer.

#### BIODIVERSITY FELLOWSHIPS UBC Centre for Biodiversity Research The University of British Columbia

We seek applicants for three two-year POSTDOCTORAL fellowships in the new University of British Columbia (UBC) Centre for Biodiversity Research. The Centre is made up of over 30 members of the UBC Science Faculty with interests in systematics, ecology, and conservation. Preference will be given to candidates with bold ideas, demonstrated research ability, and strong communication skills. Successful candidates will be expected to conduct original research on core problems in biodiversity and conservation, and to foster interactions within the centre. Starting date: 1 September 1996. Salary \$29,000 per annum (Canadian). Send curriculum vitae, three letters of reference, and a brief statement of goals to: J. N. M. Smith, Director, Centre for Biodiversity Research, Department of Zoology, UBC, 6270 University Boulevard, Vancouver, B.C. V6T 124 Canada. FAX: 604-822-2416; Email: smith@zoology.ubc.ca. Closing date for applicatits, especially women, aboriginal people, visible minorities, and persons with disabilities.

#### **POSITIONS OPEN**

#### UNIVERSITY OF CHICAGO Postdoctoral Fellowship in AIDS Research

The University of Chicago is seeking applications from qualified applicants for THE JOHN S. BARAN FELLOWSHIP IN AIDS RESEARCH. Application deadline is April 30, 1996. Applicants must have a strong interest in AIDS research and will be asked to develop an AIDS-related research project in an immunology laboratory. We offer postdoctoral training in preparation for research and teaching in HIV, immunology, and virology. Fellowships are for one year, renewable for a second. Applicants should contact the Committee on Immunology, University of Chicago. For more information, including faculty research descriptions and addresses, please contact: Ms. Barbara Patterson, Committee on Immunology, MC1089, The University of Chicago, 5841 South Maryland Avenue, Chicago, IL 60637 or http:

www.bsd.uchicago.edu. The University of Chicago is an Affinnative Action/Equal Opportunity Employer.

#### POSTDOCTORAL POSITION Matrix Developmental Biology/Transgenesis University of Pennsylvania Veterinary School

Position available immediately to study molecular mechanisms of skeletogenesis and hematopoiesis using transgenic mouse models (*Nature*, 365:56, 1993). Candidates should have a Ph.D. and/or M.D., interest in extracellular matrix, and background in molecular and cellular biology. Please send 1) brief statement of research interests, capabilities, and goals; 2) curriculum vitae; and 3) addresses and numbers of three references to: Dr. Olena Jacenko, University of Pennsylvania School of Veterinary Medicine, 3800 Spruce Street, Philadelphia, PA 19104-6046. Email: jacenko@pobox.upenn.edu. *An Equal Opportunity/Affirmative Action Employer*.

POSTDOCTORAL POSITION available to study the binding sites of tRNA, antibiotics, and other ligands on the ribosome, and the topography of other ribonucle-oprotein complexes, by site-directed photochemical crosslinking. This interdisciplinary project includes use of recombinant RNA techniques for the preparation of photoreactive RNA molecules, design and synthesis of modified nucleosides for photo-crosslinking, and the development of new strategies for analyzing protein-RNA and RNA-RNA crosslinks at the molecular level. Salary commensurate with experience. Review of applications begins 1 April 1996 and will continue until a suitable candidate is identified. Send curriculum vitae and three letters of recommendation to: Dr. Robert A. Zimmermann, Department of Biochemistry and Molecular Biology or Dr. Stephen S. Hixson, Department of Chemistry, University of Massachusetts, Amherst, MA 01003. An Affirmative Action/Equal Opportunity Employer.

POSTDOCTORAL POSITION available immediately in plant molecular genetics to identify microsatellite molecular markers for resistance genes in insect and disease resistant potato germplasm and contribute to linkage map construction. Knowledge of recombinant DNA techniques and classical and molecular genetics is required. Send curriculum vitae and list of references to: Dr. John R. Stommel, USDA-ARS, VL, Building 010A, BARC-West, Beltsville, MD 20705. Email: jstommel@asrr.arsusda.gov. Equal Opportunity/Affirmative Action Employer.

#### HARVARD MEDICAL SCHOOL

POSTDOCTORAL POSITIONS to study signal transduction, cytokine cascades, and transcriptional regulation in cells responding to stress (heat shock, oxidative, radiation) and acute inflammation. Experience in molecular biology (gene expression/transcription regulation) and protein phosphorylation. Send curriculum vitae to: Drs. S. K. Calderwood and M. A. Stevenson, Dana Farber Cancer Institute and Joint Center for Radiation Therapy, JFB 205, 44 Binney Street, Boston, MA 02115.

An Equal Opportunity/Affirmative Action Employer.

#### POSTDOCTORAL FELLOW

Seeking a POSTDOCTORAL FELLOW to work on mechanism of bacterial chemotaxis or other bacterial behavior. Successful fellowship application is desirable. Candidates should send a curriculum vitae and three letters of recommendation to: Dr. Julius Adler, University of Wisconsin-Madison, Department of Biochemistry, 420 Henry Mall, Madison, WI 53706. Telephone: 608-262-3693; FAX: 608-262-3453.

#### TENURE-TRACK SCIENTIST

# Cellular, Molecular or Developmental Neurobiology National Institute of Neurological Disorders and Stroke National Institutes of Health (NIH)

The Intramural Research Program of the National Institute of Neurological Disorders and Stroke invites applications to fill a tenure-track or tenured research position at the NIH. We are seeking exceptional candidates to establish an independent and imaginative research program in cellular, molecular or developmental neurobiology, preferably, but not necessarily, in mammalian systems. A Ph.D. or M.D. and two or more years of productive postdoctoral experience are required. Research support (positions, laboratory budget and space) will be provided by NINDS. The level of appointment (tenure-track investigator or tenured scientist), salary and research resources will be commensurate with the qualifications and experience of the candidate.

Applicants should send curriculum vitae, bibliography, statement of research interests and three letters of reference to: Dr. Story Landis, c/o Alfred L. Salas; Building 31, Room 8A23, NINDS, NIH; 31 Center Drive, MSC 2540; Bethesda, MD 20892-2540.

Applications must be postmarked by March 31, 1996.

NIH is an Equal Opportunity Employer

# LICENSING ASSOCIATE

Memorial Sloan-Kettering Cancer Center has an excellent opportunity to handle all phases of invention development and technology transfer.

Specific challenges will include interacting with research laboratories to find and develop technologies with commercial potential, analyzing technical and market risks and seeking potential licensees to invest resources in the development of technology. Other challenges will involve supervising the filing and prosecution of patent applications and advising researchers regarding intellectual property matters, consulting agreements, material transfer agreements and industrial sponsored research.

We require a substantial, relevant background in healthscience. Experience in business and marketing is desirable.

We offer a competitive salary and a comprehensive benefits program. Please send your resume to: Andrew D. Maslow, Director, Office of Industrial Affairs, MSKCC, 1275 York Avenue, New York, NY 10021. EOE/AA.



THE TIME IS NOW.

# AN IMPORTANT LINK IN HEALTHCARE SERVICES

**S**mithKline Beecham is a \$9.2 billion global pharmaceutical and healthcare company. Our world famous products and reputation mean unsurpassed opportunities for individuals to combine their scientific and marketing expertise for the following positions:

#### **Oncology Medical Associates**

In anticipation of FDA approval of SmithKline Beecham's latest breakthrough in cancer therapeutics, we are seeking individuals to expand a nationwide sales force of highly skilled professionals. Because oncology is different from other areas of healthcare, it is necessary that qualifying candidates possess a high degree of empathy and flexibility. Among their responsibilities, selected candidates will develop business plans, maximize customer rapport, create effective presentations, coordinate educational symposia, maintain a technical data base and create an environment where customers share SmithKline Beecham's mission to improve healthcare. Candidates should have at least 6 years' experience in a technical sales or marketing capacity, a PharmD or PhD in Pharmacology or related scientific discipline, and expert knowledge of oncology and the changing medical environment. Refer to Job Code OMA.

#### **Regional Medical Associates**

As Medical Associates, successful candidates will establish relationships within major managed care organizations for the purpose of acting as scientific liaisons and providing in-depth information regarding SmithKline Beecham products. This includes training representatives and medical professionals, and being responsible for outcome models. To qualify, you must have a PharmD or PhD in Pharmacology, strong marketing/communication skills and a high degree of initiative. Refer to Job Code RMA.

Both Oncology Medical Associate and Regional Medical Associate positions are available in various locations across the United States. Therefore, when you reply, please indicate if you are able to relocate and/or what geographic area to which you are limited. 40-50% travel required for both positions.

We offer one of the best compensation packages - including a car - in the industry. If you'd like to be a part of our success, send your resume with salary history, indicating desired Job Code, to: SmithKline Beecham, Central Employment, Job Code \_\_\_\_, 200 N. 16th Street, Philadelphia, PA 19101. We are an Equal Opportunity Employer, M/F/D/V.



# Join the QIAGEN Team!

QIAGEN, the world wide leader in nucleic acid purification, is seeking highly motivated and talented individuals to join our rapidly growing team. QIAGEN is committed to providing high quality, innovative purification products to the molecular biology and molecular diagnostic research communities.

Associate Product Manager - Genomic Sequencing. Expand your scientific horizons in a team dedicated to providing tools for the 21st century in the area of high-throughput DNA sequencing/genome analysis. Applicants should have an M.S. or Ph.D. degree in a molecular biology-related area and a minimum of two years experience in high-throughput DNA sequencing. Sales and marketing experience is a plus. (REF.APM/GS-0296)

Associate Product Manager - Molecular Biology. Take advantage of expanding opportunities in the molecular research and diagnostic markets! Applicants should have an M.S./B.S. degree in a molecular biology-related field, significant molecular biology-related laboratory research and/or two years of sale or marketing experience that includes DNA purification products. (REF.APM/MB-0296)

For both positions responsibilities include marketing, conceptualizing, coordinating product launches, contacting customers, and supporting the sales team. 30% travel is typical. Outstanding communication skills are required.

QIAGEN is a rapidly growing, highly successful company located in the western San Fernando Valley. The corporate atmosphere is friendly and informal, and provides a team working environment. QIAGEN offers competitive salaries, a comprehensive benefit package including a 401(k) plan, and is committed to alding employee personal and professional development with sponsored continued education. If you think you have what it takes to contribute to QIAGEN's continued success, take this opportunity to become part of the QIAGEN team.

Send resumes to Human Resources/(Ref. No.), QIAGEN INC., 9600 DESOTO AVE, CHATSWORTH, CA 91311, FAX 800-718-2056

QIAGEN Inc.

9600 DeSoto Avenue Chatsworth • CA 91311 • USA Telephone 800-426-8157 Fax 800-718-2056



A SCIENCE Special Feature Story

# Women and Minorities in Science

Bonus Distribution to NOBCChE and MWIS

Issue date: 29 March • Space reservation deadline: 12 March

Bonus Distribution. Copies of this issue will be distributed by SCIENCE staff at the National Organization for Black Chemists and Chemical Engineers (NOBCChE) national conference in Detroit, Michigan and to the members of Minority Women in Science (MWIS).

Placement on SCIENCE Classified Advertising On-Line. Every recruitment advertisement in SCIENCE receives placement on the SCIENCE world wide web service at no extra charge.

http://www.aaas.org

For more information or to reserve your space, contact Janis Crowley.

Phone: (212)496-7704 • Fax: (202)289-6742

**Science** 

# **P**rotein Crystallographer

# New Approaches to Crop Protection

DuPont Central Research and Development is seeking a highly motivated protein crystallographer to join a multidisciplinary group using structure-based inhibitor design for the discovery of novel herbicides, fungicides, and insecticides.

The ideal candidate should have a Ph.D. in the biological or chemical sciences and at least two years postdoctoral experience with demonstrated excellence in protein crystallography and experience in de novo protein structure determination

The successful individual will participate in integrating protein structure determination with the chemistry, enzymology, and molecular modeling groups. You must be capable of working and communicating effectively in a diverse group of biochemists, chemists, and biologists.

You will enjoy our state-of-the-art Experimental Station facilities, as well as access to the Advanced Photon Source. This position offers a highly competitive salary and an excellent benefits package. We are located in Wilmington, DE, an area that offers an attractive lifestyle with easy access to all the cultural, academic and recreational activities of the Eastern Seaboard. For consideration, please send your resume with salary history, no later than March 11th, to: DuPont Human Resources, PSS-0121, Wilmington, DE 19898 OR you may fax it to: 800-631-2206, Attn: PSS-0121. An equal opportunity employer.



Central Research and Development

Faculty Position in Cytokine Regulation Departments of Surgery and Physiology Michigan State University

The Departments of Surgery and Physiology invite applications for a tenure-track joint appointment, preferably at the ASSISTANT or ASSOCIATE PROFESSOR level. We seek an outstanding candidate with a Ph.D. degree or equivalent with training in physiology, biochemistry or molecular biology. Preference will be given to individuals with an interest in metabolic regulation with an emphasis on cytokine regulation of lipid and carbohydrate metabolism. We seek individuals using modern molecular approaches to understand normal and disease processes associated with trauma or chronic disease. Candidates are expected to develop a vigorous externally funded research program and to teach undergraduate, graduate, or medical students. Interested individuals should provide a complete curriculum vitae, a brief statement of research interests and bibliography and copies of key publications or reprints. Applicants should arrange to have at least three (3) letters of recommendation sent from scientists who can evaluate their accomplishments and future potential for research and teaching. Applications should be sent to: James Harkema, M.D., Search Committee Chairperson, Department of Surgery, Michigan State University, B424 Clinical Center, East Lansing, Michigan 48824-1315. Application deadline: March 15, 1996 or until filled.

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

#### GLOBAL CAREER OPPORTUNITIES

# Institute of Molecular Biology (IMB) Academia Sinica announces an

#### INTERNATIONAL SYMPOSIUM

"Molecular Biology: The Next Decade"

May 20-22, 1996

to celebrate the 10th anniversary of the establishment of IMB. Speakers from local institutions in Taiwan and from abroad will gather and discuss the future development of molecular biology in relation to the fields of biology, medicine and biotechnology. Poster session will also be held to facilitate interaction between the speakers and the symposium participants.

#### **Currently Scheduled Speakers:**

Tom Cech (U. Colorado-Boulder) Soo-Chen Cheng (IMB) Yueh-Hsiu Chien (Stanford U.) Chen-Kung Chou (Yang-Ming U.) Mark M. Davis (Stanford U.) Philip C. Hanawalt (Stanford U.) Yuh Nung Jan (UCSF) Rudolf Jænisch (Whitehead Inst.)

#### Sponsors:

Academia Sinica, Taipei, ROC Foundation for the Advancement of the Outstanding Scholarship, ROC National Health Research Institute, ROC National Science Council, ROC The Chinese Society of Cell and Molecular Biology, ROC

#### Main Topics:

Cellular Communication and Signal Transduction Nuclear Structure & Function Structural Biology and Medicine Genetics and Development

Abstract deadline: March 15, 1996.

Ulrich K. Laemmli (U. Geneva)
Sheng-Chung Lee (NTU Med. Sch)
Tom Maniatis (Harvard U.)
Baldomero M. Olivera (U. Utah)
Robin E. Reed (Harvard U.)
Jerry H.C. Wang (Hong Kong U.S.T.)
Jonathan Weissman (Yale U.)
Don C. Wiley (Harvard U.)

#### Organizers:

Soo-Chen Cheng (IMB)
Bon-chu Chung (IMB)
Jaulang Hwang (IMB)
Ming-Zong Lai (IMB)
James Shen (IMB, Co-chair)
Ming F. Tam (IMB)
Chung Wang (IMB)
James Wang (Harvard U., Co-chair)

For registration information and abstract form, please contact: Fei Chen, Institute of Molecular Biology, Academia Sinica Nankang, Taipei 115, Taiwan, R.O.C. FAX: 886-2-782-6085 email: FEICHEN@CCVAX.SINICA.EDU.TW

# Max-Planck-Institute of Cognitive Neuroscience, Leipzig

A position for a

#### cognitive neuroscientist

is available for the investigation of brain-behavior relationships in visual working memory. The successful candidate will be associated with the Experimental Neuropsychology Unit, Department of Neurology. Our principal aim is the development of cognitive experiments for fMRI. This is done in collaboration with our team of NMR physicists, who run the NMR-facilities (a Bruker scanner with a 3 Tesla magnet) and develop new scanning techniques. Furthermore we have a research unit devoted to the development of new image and signal processing algorithms. MEG and EEG is also available at the Institute.

We are looking for a colleague with research experience in cognitive psychology and knowledge of neuroanatomy and -physiology who wants to develop innovative experiments for fMRI and is willing to work in a multidisciplinary environment.

The contract will be limited to 3 years.

For further information please contact **Dr. Stefan Pollmann** (pollmann@cns.mpg.de, Tel. +49 341 9940-226, Fax -221). To apply, please send your CV along with a statement of research interests and selected publications to:

Max-Planck-Institute of Cognitive Neuroscience Verwaltung - W/N Inselstraße 22 - 26, D-04103 Leipzig Germany

#### KUWAIT INSTITUTE FOR SCIENTIFIC RESEARCH

Kuwait Institute for Scientific Research (KISR) is a nonprofit organization actively engaged in applied research in the fields of environmental and earth sciences; water resources; food resources; engineering; petroleum, petrochemicals and materials; and techno-economics.

KISR has a vacancy in the following field:

#### Plant Science

#### Major duties:

- Carry out research on date palm tissue culture propagation to include acclimatization and greenhouse transfer to increase the efficiency of the system developed.
- •Be responsible for the semi-pilot production of date palm and determine the cost of production.
- Carry out research on genetic improvement of date palm via cell culture techniques.
- Develop research projects in the field of plant cell and tissue culture for the advancement of agriculture and greenery in Kuwait.
- Interact with other scientists in promoting research activities at KISR.
- Carry out training of Kuwaiti nationals in the field of tissue and cell culture, genetics and plant science in general.

Qualifications: Applicants should have a Ph.D. in an appropriate Plant Science with 5 to 10 years of related experience, and a strong background in plant physiology and biochemistry. Familiarity with plant transformation techniques desirable. Good publication record, effective organization and communication skills essential.

KISR offers attractive tax-free salaries commensurate with qualifications and experience and generous benefits that include: gratuity, free furnished and air-conditioned accommodation, school tuition fees for children, six weeks annual paid vacation, air tickets, free medical care and life insurance.

Interested applicants are requested to send their Curriculum Vitae with supporting information not later that one month from the date of this publication, to:

Personnel Manager Kuwait Institute for Scientific Research P.O. Box 24885 13109 Safat, Kuwait.



#### Post-doct. Fellow Research Associate

Opening for a post-doctoral Fellow/Research Associate with experience in molecular biology and biochemistry for basic science project involving the urokinase receptor and molecular regulation of plasminogen activation. Please send CV including the names and addresses of three references to: Dr. Douglas Cines, Dept. Pathology and Laboratory Medicine, Hospital of the University of Pennsylvania, 7 Founders Pavilion, 3400 Spruce St., Philadelphia, PA 19104. The



University of Pennsylvania is an affirmative action equal opportunity employer.

BIOPHARMACEUTICAL CAREER OPPORTUNITY

### SENIOR SCIENTIST

Cellular & Molecular Immunology BE PART OF THE SOLUTION



You can help make a difference in the world. At ImClone Systems, a leading biopharmaceutical company, we are developing revolutionary break-throughs in the latest therapeutic products for the treatment of cancer and cancer related disorders.

> As a Senior Scientist in Cellular & Molecular Immunology, you will work on studies involving antibody-directed

immunotherapy against tyrosine kinase receptors involved in cancer, hematopoiesis and angiogenesis.

The successful candidate will have 4-8 years of laboratory experience beyond a post-doc. Expertise in the following areas will be considered: cancer immunology (including animal models); CTL isolation and expansion; the molecular biology of the TCR immunoglobulins and peptide vaccines.

Along with state-of-the-art systems and the most current technology, we offer an excellent salary with outstanding benefits. For immediate consideration, qualified candidates can mail or fax resume and salary requirements to:

Human Resources Dept. LC-SM ImClone Systems Incorporated 180 Varick Street New York, NY 10014 Fax 212-645-2054



WE ARE AN EQUAL OPPORTUNITY EMPLOYER

# DEPARTMENT OF ENERGY Human Genome Program Announcement Technological Advances

Energy Research Financial Assistance Program Notice 96-08: Human Genome Program Technological Advances

**ACTION:** Notice inviting grant applications

SUMMARY: The Office of Health and Environmental Research (OHER) of the Office of Energy Research (ER), U.S. Department of Energy, hereby announces its interest in receiving grant applications in support of the DOE Human Genome Program (HGP). This program is a coordinated, multidisciplinary, goal-oriented research effort to obtain a detailed understanding of the human genome at the molecular level. The objective of this notice is to promote substantive improvements in high-throughput, integrated approaches to large-scale human genome sequencing and its analysis. The solicited topics are: (1) supportive instrumentation and automation systems; (2) assembly of multi-megabase scale, ordered and sequence-ready DNA clones, (3) informatics for the rapid assembly, analysis, and annotation of data from high-throughput sequencing; and (4) informatics for facile submission, retrieval, and visualization of data for single or multiple related databases, specifically including the Genome Data Base and the Genome Sequence Data Base. Applicants must address clearly how the proposed work will help achieve the sequencing goals of the HGP. Collaborative, multidisciplinary efforts are specifically encouraged.

DATES: Potential applicants are strongly encouraged to submit a brief preapplication. All preapplications, referencing Program Notice 96-08, should be received by DOE by 4:30 P.M. E.S.T., March 28, 1996. A response discussing the potential program relevance of a formal application generally will be communicated to the applicant within 30 days of receipt. The deadline for receipt of formal applications submitted in response to this notice must be received by 4:30 P.M., E.D.T., July 11, 1996, in order to be accepted for merit review in September 1996 and to permit timely consideration for awards in fiscal year 1997.

ADDRESSES: All preapplications, referencing Program Notice 96-08, should be sent to Ms. Joanne Corcoran, U.S. Department of Energy, Office of Health and Environmental Research, ER-72, 19901 Germantown Road, Germantown, MD 20874-1290.

After receiving notification from DOE concerning successful preapplications, applicants may prepare formal applications and send them to: U.S. Department of Energy, Office of Energy Research, Grants and Contracts Division, ER-64, 19901 Germantown Road, Germantown, MD 20874-1290, ATTN: Program Notice 96-08. The above address for formal applications also must be used when submitting formal applications by U.S. Postal Service Express Mail, any commercial mail delivery service, or when handcarried by the applicant.

FOR FURTHER INFORMATION CONTACT: Dr. Gerald Goldstein, if referencing topic (1); Dr. Marvin Stodolsky, if referencing topic (2); and Dr. Jay Snoddy, if referencing topics (3) or (4) at the U.S. Department of Energy, Office of Health and Environmental Research, ER-72, 19901 Germantown Road, Germantown, MD 20874-1290, by telephone (301) 903-6488, by facsimile (301) 903-8521, or preferably by E-mail, joanne.corcoran@oer.doe.gov. General HGP information can also be obtained on the World Wide Web (WWW) Internet browsers at: http://www.orl.gov/techresources/human\_genome/home.html, and sites linked to these WWW pages. The 5-year goals of the U.S. HGP are published in the journal *Science*, volume 262, pages 43-46.

SUPPLEMENTARY INFORMATION: The brief preapplication, in accordance with 10 CFR 600.10(d)(2), should consist of two to three pages of narrative describing the research objectives and methods of accomplishment. The preapplications will be reviewed for relevance to the notice, and further instructions will be provided with the response. Preapplications determined by staff of the Office of Health and Environmental Research to be insufficiently directed at the goals of this notice will he returned without further review to the applicant. Telephone and FAX numbers are required parts of the preapplication, and electronic mail addresses are desirable.

It is anticipated that approximately \$2,000,000 will be available for grant awards in this area during FY 1997, contingent upon availability of appropriated funds. Multiple year funding of grant awards is expected, and is also contingent upon availability of funds, progress of the research, and continuing program need. Projected awards will be in the range of \$50,000 per year up to \$1,000,000 per year with terms of 2 to 3 years.

Information on the development and submission of applications, eligibility, limitations, evaluation, selection process, and other policies and procedures may be found in 10 CFR Part 605, and in the Application Guide for the Office of Energy Research Financial Assistance Program. The Application Guide is available from the U.S. Department of Energy, Office of Health and Environmental Research, Health Effects and Life Sciences Research Division, ER-72, 19901 Germantown Road, Germantown, MD 20874-1290. Telephone requests may be made by calling (301) 903-6488. Internet requests can be made to: joanne.corcoran@oer.doe.gov. Electronic access to ER's Financial Assistance Guide is possible via the Internet using the following E-mail address: http://www.er.doe.gov

The Office of Energy Research, as part of its grant regulations, requires at 10 CFR 605.11(b) that a grantee funded by ER and performing research involving recombinant DNA molecules and/or organisms and viruses containing recombinant DNA molecules shall comply with the National Institutes of Health "Guidelines for Research Involving Recombinant DNA Molecules" (59 FR 34496, July 5, 1994) or such later revision of those guidelines as may be published in the Federal Register.

The Catalog of Federal Domestic Assistance Number for this program is 81.049, and the solicitation control number is ERFAP 10 CFR part 605.

FROM: Federal Register, Wednesday, February 7, 1996, Vol. 61, No. 26, pages 4630-4631. "Energy Research Financial Assistance Program Notice 96-08: Human Genome Program Technological Advances"



#### GRANTS FOR INTERNATIONAL JOINT RESEARCH IN THE AREAS OF MATERIALS, ENERGY AND GLOBAL ENVIRONMENT

The New Energy and Industrial Technology Development Organization (NEDO), a Japanese governmental implementing agency supervised by the Ministry of International Trade and Industry (MITI) of Japan, has been carrying out an International Joint Research Program since 1988. This program aims to contribute to the enhancement of the international level of industrial technology as well as to the advancement of international exchange by supporting international joint research teams which conduct superior research. In addition to supporting international joint research teams which conduct original and innovative basic research in the materials area, international joint research teams which conduct research in the energy area and the global environment area will be provided with grants in FY 1996. The program in the global environment area will be conducted jointly with the Research Institute of Innovative Technology for the Earth (RITE).

Research grants will be provided to "International Joint Research Teams" which fulfill the following main requirements:

- 1. Each team, in principle, must be composed of four or more researchers;
- 2. Each team must consist of researchers of two or more different nationalities;
- The research organizations where the team members' major activities take place must be located in two or more countries.
- Each team must appoint a research coordinator and an accounting coordinator. The accounting coordinator must be responsible for accounting matters and function as the liaison between the team and NEDO.
  - The accounting coordinator's organization and research site must be located in Japan, and he/she must be able to communicate with NEDO in Japanese about all accounting matters. The research coordinator can also hold the post of accounting coordinator.

FY 1996's program is shown below.

Research Area	Field of Research	Amount of Each Grant	Number of Themes to be Adopted	Recipients of Applications
Materials	Basic research concerning the investigation and elucidation of materials     Basic research concerning the practical use of materials	about 30,000,000 yen in FY 1996	3 themes	NEDO (Note a.)
Energy	Practical research on electric power generation technologies using oil-alternative energy, on load leveling technologies and on global environment conservation related to such technologies.	about 30,000,00 yen in FY 1996	3 themes	
Global Environment	(Basic research) <b>Basic research</b> on conservation and improvement of the global environment.	about 24,000,000 yen in FY 1996	1 theme	RITE (Note b.)
	(Practice research)  Practical research concerning the production, generation and use of oil-alternative energy (excluding electric power generation technologies) which contributes to the conservation and improvement of the global environment	about 30,000,000 yen in FY 1996	3 themes	

(Recipients of applications)

Note a. Materials and Energy area

International Joint Research Division, Industrial Technology Department

New Energy and Industrial Technology Development Organization (NEDO)

: PO Box 1151, 29F, Sunshine 60 Bldg. Address

3-1-1 Higashi-Ikebukuro, Toshima-ku, Tokyo, 170 Japan

Phone No.: 81-3-3987-9357 Telefax No.: 81-3-3981-1536

Note b. Global environment area

Research Proposals Reception Section.

Research Planning Department

Research Institute of Innovative Technology for the Earth (RITE)

: 9-2 Kizugawadai Kizu-cho Soraku-gun, Address

Kyoto, 619-02 Japan

Phone No.: 81-774-75-2302

Telefax No.: 81-774-75-2314

Please be informed that the amount of each grant and the number of themes to be adopted may be changed, and that this grant program is subject to government budget approval. A research team may submit an application a maximum of two times for a grant on the same subject.

The application period is from January 18, 1996 to April 18, 1996.

No applications will be accepted later than April 18th.

ATTENTION: If there are some discrepancies in a submitted application, for example, it does not follow the Application Guidebook or the research contents are different from the proposed research area, it will be considered invalid.

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Applications with detailed curriculum vitae together with names, addresses, telephone and fax numbers of four referees should be mailed or faxed to: Prof George Abouna, Dean, College of Medicine & Medical Sciences, Arabian Gulf University, P0 Box 22979, Manama, Bahrain. Fax: (973) 230730, Tel: (973) 452877

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#### POSTDOCTORAL FELLOW AND RESEARCH ASSISTANT POSITIONS

Available immediately for a well-funded program to study cell growth regulation and signal transduction by a new class of lipid second messengers. Candidates should have background in molecular biology, signal transduction, or protein purification. Please send curriculum vitae and three letters of recommendation to: Dr. Sarah Spiegel, Department of Biochemistry and Molecular Biology, Georgetown University Medical Center, 353 Basic Science Building, 3900 Reservoir Road, NW, Washington, DC 20007. Telephone: 202-687-1432; FAX: 202-687-0260; Email: spiegel@biochem1. basic-sci.georgetown.edu. Affirmative Action/Equal Opportunity Enployer.

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POSTDOCTORAL FELLOW. Study signal transduction in gap junctional communication regulated cell proliferation. Molecular biologist experienced in cloning, differential display, 2D-PAGE, and receptor biology. Send or FAX résumé with names and telephone numbers of three references to: Shu-Chih Chen, Ph.D., Molecular Medicine, Northwest Hospital, 120 Northgate Plaza, Suite 230, Scattle, WA 98125. FAX: 206-368-3009; Email: schen@fred.fhcrc.org.

#### SENIOR POSTDOCTORAL RESEARCHER

Ph.D. or equivalent degree with major course work in biological and biomedical science; must have strong laboratory experience and background in molecular and celular biology; three years of postdoctoral laboratory experience. Project is molecular biology of tooth eruption. Salary will be commensurate with qualifications and experience. Application deadline is March 13, 1996, or until candidate is selected. Submit letter of application and résumé to: Dr. Gary E. Wise, Veterinary Anatomy and Cell Biology, School of Veterinary Medicine, Louisiana State University, Baton Rouge, LA 70803.

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ability in molecular biology and microbiology.

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Advanced degree in scientific discipline with substantial computer component preferred. Demonstrated experience supporting uses of instructional technology required. Teaching/academic experience preferred. Requires knowledge of UNIX, XWindows, Macintosh, and Windows operating systems.

Please send cover letter, résumé, plus three references with your application to:

Middlebury College Human Resources Service Building Middlebury, VT 05753

Review of applications will begin April 1, 1996. Middlebury College is an Equal Opportunity Employer.

#### FLOW CYTOMETRY MANAGER UNIVERSITY OF WISCONSIN-MADISON

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Requirements: strong background in engineering or physics, advanced skills in configurating and optimizing flow cytometry systems, extensive computer sciences experience, and excellent communication skills for consulting with and advising a diverse group of facility users. Cell or molecular biology experience desirable.

or molecular biology experience desirable.

Please send complete curriculum vitae, a statement of professional interest, and names of references to: Dr. Mark Ritter, UWCCC Flow Cytometry Committee, K4-B100, Clinical Sciences Center, 600 Highland Avenue, Madison, WI 53792.

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#### Genetic Approaches to Complex Heart, Lung, and Blood Diseases October 6 to 18, 1996

At The Jackson Laboratory, Bar Harbor, Maine. Sponsor: the National Heart, Lung & Blood Institute. Organizers: W. C. Nierman, ATTC and B. J. Paigen, TJL. Course Fee: \$850, includes meals and lodging. Information: Telephone: 207-288-6260; FAX: 207-288-8254; Email: training@aretha.jax.org. WWW: http://www.jax.org/.

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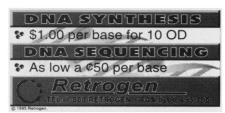
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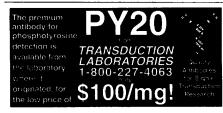
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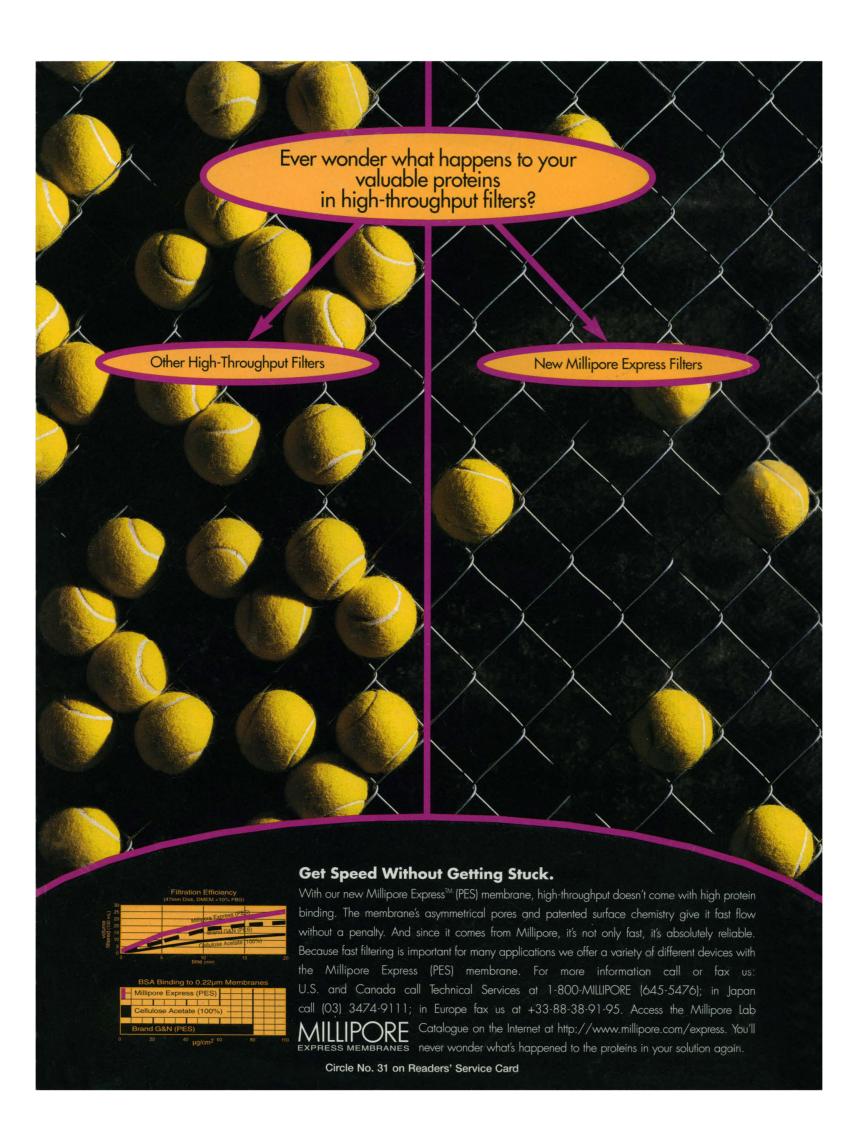
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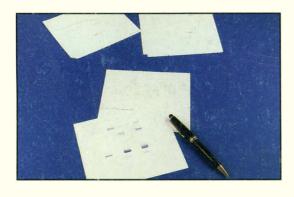
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