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ASSISTANT PROFESSOR
DEPARTMENT OF BIOCHEMISTRY
THE UNIVERSITY OF CALIFORNIA SAN FRANCISCO

The Department of Biophysics and Biochemistry of the University of California, San Francisco, has opened a tenure-track position. The assistant professor level. Criteria for appointment include: (i) exceptional research skills, evidenced by wide recognition for quality, creativity, (originality, and significance, with continued progressive achievement of these skills; (ii) strong teaching skills, evidenced by successful command of the subject, presentation skills, and skills in motivating graduate and postdoctoral students; and (iii) interest in participating in departmental and campus activities. Applicants should be specialists in molecular aspects of cell, development, structural, or molecular biology and/or genetics. Submit current curriculum vitae and evidence of meeting above criteria, including letters of reference, and information about fraction of time to be spent teaching, research, and administration. Please see Dr. John R. Walter, Director, Department of Biophysics and Biochemistry, University of California, San Francisco, CA 94143-0448. An Equal Opportunity/Affirmative Action Employer.

ASSISTANT PROFESSOR OF PHYSIOLOGY AND BIOPHYSICS (Ph.D. and/or M.D.)

Research areas: membrane biophysics including receptor mechanism in the cardiovascular system; general biophysics such as the physiology of transmembrane transport and signal transduction. Experience required in graduate level research. At least one year of postdoctoral research. Position will be filled as of June 11, 1990. Applications may be submitted through October 1, 1989. Applicants should send curriculum vitae, three letters of recommendation, and complete copies of publications. Applicants should specify if they have a Ph.D. or M.D. degree, a good track record in publications, and postdoctoral research experience with a background in cellular and/or molecular biology. The abilities to establish an independent research program in the areas of cardiovascular, gastrointestinal, developmental, endocrine, or epithelial physiology and to engage in teaching activities of the department are expected. Applicants send curriculum vitae, copies of three representative publications, and the names of three references to: Dr. Leonard R. Johnson, Director, Department of Biophysics and Biochemistry, University of California, San Francisco, CA 94143-0448. An Equal Opportunity/Affirmative Action Employer. Women and minorities are encouraged to apply.

ASSISTANT/ASSOCIATE PROFESSOR
OBESTRIC/GYNECOLOGY

California State University, Fullerton. The Department of Obstetrics and Gynecology at the State University of New York at Stony Brook (SUNY) is recruiting for a tenure-track faculty member with expertise in molecular biology. A Ph.D. in science and a strong background in molecular biology is required. The candidate will actively participate in basic research, applied clinical research, and teaching and must be able to mount an independent research program. Interested candidates should send their curriculum vitae and names of three references to: Dr. Robert Barbier, Professor and Chairman, Department of Obstetrics/Gynecology, Health Science Center, SUNY Stony Brook, Stony Brook, NY 11794. Applicants must have a Ph.D. or M.D. degree and must be committed to teaching. The position will begin July 1, 1990. Women and minority candidates are especially encouraged to apply.

SCIENCE, VOL. 248

ASSISTANT PROFESSOR OF BIOLOGY

Previous vacancy has been redefined. Applicants with teaching and research abilities in either microbiology or genetics are invited for a tenure-track position in the Department of Biology. Teaching responsibilities include general microbiology or genetics and other courses depending on candidate's expertise. Opportunity for participation in departmental and campus activities. Applicants should be specialists in molecular aspects of cell, development, structural, or molecular biology and/or genetics. Submit current curriculum vitae and evidence of meeting above criteria, including letters of reference, and information about fraction of time to be spent teaching, research, and administration. Please see Dr. John R. Walter, Director, Department of Biophysics and Biochemistry, University of California, San Francisco, CA 94143-0448. An Equal Opportunity/Affirmative Action Employer.

ASSISTANT PROFESSOR OF BIOLOGY

The Department of Physiology at Jefferson Medical College, Philadelphia, Pennsylvania, has a full-time, 12-month faculty position for a molecular biologist/physiologist to begin July 1, 1990. Excellent space and working conditions are available. Applicants should have a Ph.D. or M.D. degree and 2 to 3 years of relevant postdoctoral experience. Involvement in an area of molecular biology relevant to physiology is preferred. Evidence of independent research and ability to develop grant applications is important. Applicants should send curriculum vitae, a statement of their research interests and experience, and arrange to have three letters of recommendation sent to: Dr. Allan M. Leff, Chairman, Department of Physiology, Jefferson Medical College, Thomas Jefferson University, 1020 Locust Street, Philadelphia, PA 19107-6799. An Equal Opportunity/Affirmative Action Employer.

ENVIRONMENTAL CHEMIST

The Department of Agricultural Chemistry at Oregon State University (OSU) invites applications for a tenure-track ASSISTANT PROFESSOR position available 1 January 1991. Applicants must have a Ph.D. in chemistry, biochemistry, or closely related field and research experience in the distribution, movement, or transformation of chemical pollutants. Applicants with research interests in aquatic or terrestrial systems are encouraged to apply. Candidates should have some experience in grant writing. The position will begin 1 July 1991. Women and minority candidates are encouraged to apply.

SCIENCE, VOL. 248

ASSOCIATE PROFESSOR
MATER Nasal FETAL MEDICINE

The University of Alabama at Birmingham (UAB), Department of Obstetrics and Gynecology, is seeking to fill a tenure-track position. Candidates should be Board-eligible or Board-certified in obstetrics and gynecology. Individual will serve county health department obstetric clinics and serve as a consultant to nurse midwifery program. Responsibilities include patient care, research, and teaching of students rotating through Ob/Gyn service and Ob/Gyn residents. Additional duties will consist of a part-time administrative position as assistant director of the women's health education program. Interested persons please send curriculum vitae, two sets of three references to: Dr. Raymond P. Bugbee, Chair, Department Search Committee, Department of Agricultural Chemistry, Oregon State University, Corvallis, OR 97331. Application deadline is 1 August 1989. OSU is an equal opportunity/affirmative action employer and complies with Section 504 of the Rehabilitation Act of 1973. OSU has a policy of being responsive to the needs of dual-career couples.

ASSOCIATE PROFESSOR
MATER NASAL FETAL MEDICINE

The University of Alabama at Birmingham (UAB), Department of Obstetrics and Gynecology, is seeking to fill a tenure-track position. Candidates should be Board-eligible or Board-certified in obstetrics and gynecology. Individual will serve county health department obstetric clinics and serve as a consultant to nurse midwifery program. Responsibilities include patient care, research, and teaching of students rotating through Ob/Gyn service and Ob/Gyn residents. Additional duties will consist of a part-time administrative position as assistant director of the women's health education program. Interested persons please send curriculum vitae, two sets of three references to: Dr. Raymond P. Bugbee, Chair, Department Search Committee, Department of Agricultural Chemistry, Oregon State University, Corvallis, OR 97331. Application deadline is 1 August 1989. OSU is an equal opportunity/affirmative action employer and complies with Section 504 of the Rehabilitation Act of 1973. OSU has a policy of being responsive to the needs of dual-career couples.
POSITIONS OPEN

MEDICAL/VETERINARY ENTOMOLOGIST

ASSISTANT PROFESSOR, tenure track. The Department of Entomology, University of Wisconsin-Madison, invites applications for a full-time, 1-year position. The University is conducting a laboratory research on host/pathogen/pest relationships of insects of medical/veterinary importance. An innovative, interdisciplinary program that combines entomology and microbiology at the basic understanding of arthropod-borne diseases is expected. Development and teaching a course in medical/veterinary entomology is required. Submit a letter of application, curriculum vitae, three letters of reference by 1 August 1990 to: Ma. Carol Scheelhe, 237 Russell Laboratories, 1650 Linden Drive, Madison, WI 53706. The University of Wisconsin-Madison provides Equal Opportunities for admission and employment.

SOIL PHYSICS AND SOIL/ATMOSPHERE INTERACTIONS. Department of Soil Science, University of Minnesota. ASSISTANT PROFESSOR, 12-month, tenure-track position available 1 October 1990. A Ph.D. in soil science or closely related field at the time of assuming position is required. Duties include teaching undergraduate and graduate courses, supervision of graduate and postdoctoral students, and developing an active research program in fundamentals of soil physics and the role of soil physics with the integration of bio-physical modeling. Application, curriculum vitae, relevant transcripts, one-page statement of professional goals, names, addresses, and telephone numbers of three references should be sent by 15 August 1990 to: Dr. S. C. Gupta, Department of Soil Science, 1991 Upper Buford Circle, University of Minnesota, St. Paul, MN 55108. The University of Minnesota is an Equal Opportunity Educator and Employer and specifically encourages applications from women and minorities.

COMPARATIVE ANIMAL ANATOMIST. Tenure-track ASSISTANT PROFESSOR. Spring of 1991. Ph.D. required. Responsibilities include teaching comparative vertebrate anatomy, development of an advanced level course, participation in general biology program, and supervision of master's candidates. Research in comparative anatomy is expected. Application including curriculum vitae, a brief statement of teaching and research goals, graduate transcripts, and the names, addresses, and telephone numbers of three references should be sent by 30 September 1990 to: Dr. Darrell Moore, Chair of Search Committee, Department of Biological Sciences, East Tennessee State University, P.O. Box 23, 590A, Johnson City, TN 37614.

East Tennessee State University is an Affirmative Action/Equal Opportunity Employer.

The Department of Biochemistry at Eastern Virginia Medical School has a faculty position at the level of ASSISTANT OR ASSOCIATE PROFESSOR. This is a tenure-eligible position with a competitive 12-month salary and is an excellent opportunity for an independent research program and teaching. Successful applicants are expected to develop a strong research program in an area of interest in modern biochemistry or molecular biology such as the mechanism of gene regulation, DNA-protein interactions, metabolic regulation, enzyme structure and mechanism, or hormone receptors and membrane signal- ing. Faculty members will be expected to attract independent research grants and to spend a major part of their effort in research. They will be encouraged to publish in refereed scientific journals and to participate in professional meetings and other activities. They will be expected to teach in the basic science courses and, when opportunity arises, to participate in the graduate program. Please send curriculum vitae, a statement of research interests and plans, and three letters of reference to: Dr. Karl A. Schellenberg, Chairman, Department of Biochemistry, Eastern Virginia Medical School, 700 Olney Road, Norfolk, VA 23501.

CELL PHYSIOLOGY/MOLECULAR BIOLOGY

ASSISTANT PROFESSOR/INSTRUCTOR. In the Division of Nephrology, Department of Medicine, Johns Hopkins University School of Medicine. Ph.D. or M.D. to develop a laboratory investigating regulation of function of renal transporters using techniques of cell and molecular biology. Experience in techniques of recombinant DNA most important. Send curriculum vitae, bibliography, and three letters of recommendation to: Dr. Robert J. Wang, Division of Nephrology, 217 Hunterian, Johns Hopkins University School of Medicine, 725 North Wolfe Street, Baltimore, MD 21205.

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8 JUNE 1990

POSITIONS OPEN

LARGE-SCALE OCEAN BIOGEOCHEMISTRY

The biological oceanography and geochemistry/marine chemistry groups at the Scripps Institution of Oceanography, University of California, San Diego, intend to appoint a PROFESSOR(s) at any level (tenure or tenure track) with a distinguished record or demonstration of potential for outstanding graduate teaching. Assistant-level candidates will be expected to show evidence of their potential through a publication record appropriate for their experience and letters of recommendation. The successful candidate will be expected to join the Scripps faculty and to participate in the Scripps Graduate Program.

We intend to enhance the study of large-scale, interdisciplinary problems in the water column, such as the use of chemical (including tracer) tracers to study biologically mediated processes, specifically primary production and the flux of organic carbon, by innovative methods relatively free of encumbrance. The successful candidate(s) will have demonstrated capability to devise and/or choose appropriate methods, concern for analytical accuracy and statistical replication, and interpretation of results in the context of knowledge of oceanic and biogeochemical processes. Experience in large, multi-investigator programs, and in sea-going, is desirable but not essential.

Please send a letter of application with curriculum vitae including a description of research interests, list of publications, names and telephone numbers of five references to: Chairman, Biogeochemistry Search, Graduate Committee, A-008, Scripps Institution of Oceanography, University of California, San Diego, La Jolla, CA 92037. Closing date for applications is 1 September 1990. An Equal Opportunity/Affirmative Action Employer.

POSITIONS OPEN

CLINICAL CHEMISTRY FELLOWSHIPS

MAYO CLINIC, ROCHESTER, MINNESOTA

The Clinical Chemistry Section at Mayo Clinic is seeking applicants for 1- or 2-year fellowships in training programs directed toward qualified individuals (Ph.D. or M.D.) in the area of clinical chemistry. Individuals completing the program are eligible for certification by the American Board of Clinical Chemistry or for subspecialty certification by the American Board of Pathology. Applications on file by July (pathology) or October (postdoctoral) 1990 will be considered for appointment in July 1991. Contact: George M. Wolfe, Ph.D., Division of Laboratory Medicine, Mayo Clinic, Rochester, MN 55905, for more information.

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Cambridge University Press (American Branch) has an immediate opening for an acquisitions editor in the physical sciences, especially in the applied fields. Our publishing program of advanced level monographs, texts, and reference works covers a wide range of disciplines, including geophysics, geology, materials science, and engineering. We prefer candidates with some graduate degree in physics or chemistry and prior publishing experience will be commensurate with experience and professional qualifications. Please apply in writing and indicate your salary requirements. Cambridge University Press, 40 West 20th Street, New York, NY 10011.

ENVIRONMENTAL CHEMIST

Exxon Biomedical Sciences, Inc., has an immediate opening for a qualified individual specializing in environmental chemistry. The successful candidate will have a Ph.D. in environmental chemistry or a related field, and at least 1 year of experience in EPA-funded projects and protocol development for analysis of environmental samples in water, soil/sediment, and fish tissues. In addition, the applicant should be familiar with current method of EPA methodologies for conducting effluent toxicity identification and reduction evaluations and standard methods for contaminant analysis.

The successful candidate will act as a consultant to our ecotoxicologists and to our affiliates on matters pertaining to the assessment of environmental hazards associated with products, effluents, hazardous wastes, etc. by providing analytical expertise to the design and interpretation of these programs. Client interactions are an important aspect of our work, and we are seeking an individual who has excellent communication skills. Please forward resume to: Exxon Research, Human Resources, Exxon Biomedical Sciences, Inc. Mettlers Road, CN 2350 East Millstone, NJ 08875–2350

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FACULTY POSITION

MOLECULAR NEUROBIOLOGY

A tenure-track ASSISTANT PROFESSOR position is available for an individual using molecular techniques to study problems in developmental neurobiology. The successful candidate is expected to develop a vigorous research program in association with interdepartmental programs in neuroscience and molecular biology. Candidates should send curriculum vitae, a brief research proposal, and three letters of recommendation to: Dr. R. W. Oppenheim, Department of Neurobiology and Anatomy, The Bowman Gray School of Medicine, Wake Forest University, Winston-Salem, NC 27103. An Equal Opportunity/Affirmative Action Employer.

TENURE-TRACK FACULTY POSITIONS: BIOCHEMISTRY/MOLECULAR BIOLOGY

Applications are invited for positions in the Department of Biochemistry/Molecular Biology at Kent State University. Ph.D. and postdoctoral experience, and a plan for an independent research program. Positions also involve teaching at undergraduate, graduate, and possibly postdoctoral level. Send curriculum vitae, and three letters of reference to: Chairman, Search Committee, Biochemistry Department, Kent State University, Kent, OH 44242. Kent State University provides equal opportunity to all qualified applicants without regard to race, color, national origin, religion, sex, marital status, age, or handicap.

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PLANT MOLECULAR GENETICISTS

Two tenure-track, 12-month research/teaching positions available for plant molecular geneticists with expertise in genomic mapping technologies. Individuals with nationally competitive research programs are encouraged to apply. Successful applicants will join a major interdisciplinary research effort in crop improvement. Rank (ASSISTANT, ASSOCIATE, OR FULL PROFESSOR) and salary commensurate with qualifications. Closing date: 1 August 1990 or until positions are filled. Send letter of application, curriculum vitae, and names and addresses of three references to: Dr. Gary E. Hart, Search Committee Chair, Department of Soil and Crop Sciences, Texas A&M University, College Station, TX 77843-2474. Telephone: 409-845-8293. Affirmative Action/Equal Opportunity Employer.

VISITING FACULTY POSITIONS

The Faculty of Biological Science at The University of Tulsa has openings for three VISITING ASSISTANT PROFESSORS to teach introductory courses in the areas of general biology, cellular biology, and ecology for both majors and nonmajors. The salary is competitive and the 1-year appointments begin 27 August 1990. The department has a faculty of 16 and offers B.S., M.S., and Ph.D. degrees.

The University of Tulsa is a private, comprehensive university with a strong commitment to teaching and research. Applicants should have a Ph.D. degree and a teaching experience. Send curriculum vitae and three letters of reference to: Dr. Richard L. Reeder, Faculty of Biological Science, The University of Tulsa, 600 South College Avenue, Tulsa, OK 74104.

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

MOLECULAR BIOLOGY FACULTY POSITION

A full-time faculty position, ASSISTANT OR ASSOCIATE PROFESSOR, will become open in the Department of Microbiology and Immunology. We are looking for an energetic and experienced molecular biologist (Ph.D. or M.D.) who will complement established research programs that include: virology, molecular and immunoparasitology, immunogenetics, tumor biology, and microbial pathogenesis. Space and start-up funds will be provided. Please send curriculum vitae, names of at least three references, and a statement of research interests and goals to: Richard L. Crowell, Ph.D., Chairman, Department of Microbiology and Immunology, Hahnemann University School of Medicine, 3200 Henry Avenue, Philadelphia, PA 19102-1192. Affirmative Action/Equal Opportunity Employer.

QUALITY ASSURANCE MANAGER/COORDINATOR FOR U.S. EPA'S ENVIRONMENTAL MONITORING AND ASSESSMENT PROGRAM (EMAP)

The U.S. Environmental Protection Agency's Environmental Monitoring and Assessment Program, Cincinnati, Ohio, has an immediate opening for a quality assurance manager/coordinator for EMAP. This is a national, interdisciplinary, environmental monitoring program signed principally to measure the status and trends of the nation's ecosystems (e.g., arid lands, surface waters, near coastal waters, great lakes, wetlands). The candidate will be required to package and deliver quality assurance/quality control (QA/QC) and methods development/standardization activities for the various ecosystem task groups. The position requires knowledge of ecology, chemistry, biology, statistics, computer software, and quality assurance practices. The candidate should have an advanced degree (e.g., physical science, chemical science, biology, ecology, soil science, toxicology, or plant physiology) and have experience in managing a major segment of a large-scale environmental monitoring program. Extensive travel is required. This is a civil service position with a salary range of $42,601 to $65,444 per annum. Must be a U.S. citizen.

For completion of two tenure-track FACULTY POSITIONS at the ASSISTANT PROFESSOR level, applications will be accepted for this position only. Applications from individuals interested in cellular and molecular aspects, and those interested in investigations of specific, horizontally transmitted plasmid genes, are particularly encouraged. The University of Hawaii is an Equal Opportunity/Affirmative Action Employer. Women, minorities, and members of other protected groups are encouraged to apply. Send letter of application, curriculum vitae, and names of three reference letters to: Martha A. Hall, Chair, Department of Chemistry, University of Hawaii, 1680 East-West Road, Honolulu, HI 96822. Telephone: 808-956-8517. Affirmative Action/Equal Opportunity Employer.

NEUROSCIENCE

The Department of Biology at Texas A&M University invites applications for a tenure-track FACULTY POSITIONS at the ASSISTANT PROFESSOR level. Applications from individuals interested in cellular and molecular aspects of neural development and in the cellular contributions of brain growth are particularly encouraged. The University of Hawaii is an Equal Opportunity/Affirmative Action Employer. Women, minorities, and members of other protected groups are encouraged to apply. Send letter of application, curriculum vitae, and names of three reference letters to: Martha A. Hall, Chair, Department of Chemistry, University of Hawaii, 1680 East-West Road, Honolulu, HI 96822. Telephone: 808-956-8517. Affirmative Action/Equal Opportunity Employer.
**Two Tenurable Lectureships in Zoology**

*Animal Ecologist (Position 25890)*

Applicants should be Zoologists with an appropriate doctoral degree and demonstrated research and teaching experience in Animal Ecology, as well as a solid background in biostatistics. The successful applicant will be expected to develop a second level course in Population Ecology, contribute to other ecology and related teaching, develop an active research programme and attract postgraduate students and external research funding.

**Developmental Biologist (Position 25990)**

Applicants should be Zoologists with an appropriate doctoral degree and demonstrated research and teaching experience in the Developmental Biology of animals. Preference will be given to applicants using an experimental approach. The successful applicant will be expected to develop senior teaching in Developmental Biology, as well as participate in teaching Cell Biology at First and Second Levels, develop an active research programme and attract postgraduate students and external research funding.

**Salary:** $32,197–$41,841 (each position).

The Zoology Department has 17 academic staff and 22 support staff. Research interests include terrestrial & marine ecology, genetics & conservation biology, systematics & evolutionary biology, animal physiology and palaeontology. Facilities include electron microscope unit, molecular genetics laboratory, marine field stations on Moreton Bay and at Heron Is, on the Great Barrier Reef and a 16m trawler. Recent University initiatives relevant to Zoology include the Centre for Conservation Biology, an Aquaculture Group, an emerging school of Marine Science, the Centre for Molecular Biology and Biotechnology and the Vision Touch & Hearing Research Centre.

**Closing Date:** 29 June 1990.

Please send original plus seven copies of application and resume to Director, Personnel Services, The University of Queensland, Q. 4072, Australia. More information: Professor Gordon Grigg, Department of Zoology. Fax (07) 371 0057.

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**BIOTECHNOLOGY**

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**SENIOR CLINICAL/SCIENTIFIC WRITERS**

Wyeth-Ayerst Research has immediate opportunities available in its Clinical R&D department in Radnor, PA for Senior Clinical/Scientific Writers.

The candidates we seek must have a minimum of BA/BS degree, preferably in the biological sciences, plus at least 5 years technical or medical writing experience, preferably in the pharmaceutical industry; MS/MA plus 4 years experience; or a PhD/PharmD. Demonstrated writing skills along with the ability to analyze and organize scientific data are most important.

The Senior Clinical/Scientific Writer will be involved with writing, editing, abstracting, proofreading and revising a wide variety of clinical documents for U.S. and International drug registration and marketing support. Responsibilities include organizing the presentation of clinical studies in New Drug applications (NDAs) and manuscripts and abstracts for publication.

We offer a competitive salary and extensive company benefits. For immediate consideration, please send resume, along with writing samples, and salary history to: Wyeth-Ayerst Research Personnel, Position #075, P.O. Box 8299, Philadelphia, PA 19101. Equal Opportunity Employer, M/F/H/V responses encouraged.
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NATURAL PRODUCTS BIOLOGY
Associate Research Scientist/Biological Chemist

We are searching for a highly motivated individual who is interested in the discovery of biologically active agents from natural product sources. The successful candidate will be responsible for the development of enzyme assays and data analysis to guide the initial characterization, evaluation, and isolation of bioactive natural products.

This position requires a B.S./M.S. in biochemistry or chemistry. The ideal candidate would be an experienced enzymologist, with additional background in analytical biochemistry, protein purification and chromatography. Familiarity with computer-assisted data analysis and database management would be highly preferred.

Sterling Drug offers competitive salaries and a comprehensive benefits program, along with outstanding career opportunities for personal and professional growth. For confidential consideration, please refer to position code GV-43-90, and forward your resume, with salary history/requirements and the names of three professional references to: Employee Relations, Sterling Research Group, 9 Great Valley Parkway, Malvern, PA 19355.

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POSITIONS OPEN

POSTDOCTORAL POSITION. Available in the Department of Neurology, University of California, San Francisco, to study signal transduction mechanisms involved in neural differentiation. Grant support for this project has been obtained for at least 3 years. Interested applicants should send curriculum vitae and three letters of reference to: Robert W. Martin, M.D., Building 1 Room 101, San Francisco General Hospital, San Francisco, CA 94110.

POSTDOCTORAL POSITION. Plant physiology/biochemistry/molecular biology. Available immediately. Research activities will include development of enzyme assays, purification of enzymes, and gel map proteins and mRNA interactions associated with nicotine metabolism. Send resume and addresses with telephone numbers of three references to: Dr. Lowell Bush, Department of Agroecology, University of Kentucky, Lexington, KY 40546-0091.

MALARIA RESEARCH
NATIONAL INSTITUTES OF HEALTH (NIH)

World Health Organization-funded POSTDOCTORAL POSITION available immediately to join a multidisciplinary group investigating the sexual stages of malaria. The project involves the development of a transmission blocking vaccine for malaria. Send curriculum vitae and names of three references to: Dr. David C. Kaslow, Malaria Section, Building 4 Room B1-37, NIH, Bethesda, MD 20892.

HARVARD MEDICAL SCHOOL
OR CHILDREN'S HOSPITAL
BOSTON, MASSACHUSETTS

ASSISTANT PROFESSOR OR POSTDOCTORAL appointments (two), (i) enzyme chemist with an interest in molecular biology to work on protein kinases of calculated tissues. (ii) Protein chemist. Non-collagenous proteins, protein chemistry, and molecular biology. Candidates must have M.D. or Ph.D. and relevant experience. Submit resumes to: Melvin J. Gilmer, M.D., Children's Hospital, Endocrine Building, 320 Longwood Avenue, Boston, MA 02115.

POSTDOCTORAL Position. Available immediately to study molecular genetics of human cell response to mutagen-induced DNA damage. The project will involve the use of retroviral vectors as inertial mutagens in order to identify and isolate genes of interest. Background in molecular biology, somatic cell genetics, or radiation biology is desirable. Send curriculum vitae, statement of research interests, and names of three references to: Dr. Andrew J. Grosovsky, University of California, Environmental Toxicology Program, 5419 Weber Hall East, Riverside, CA 92521.

MOLECULAR BIOLOGY/VIROLOGY

POSTDOCTORAL POSITION available immediately to study the molecular biology of baculoviruses. Research opportunities in recombinant viral pesticides, gene regulation, and expression vector system. Research experience in recombinant DNA techniques required. Send curriculum vitae and names of three references to: Dr. B. Alan Wood, Boyce Thompson Institute at Cornell University, Tower Road, Ithaca, NY 14853.

An Affirmative Action/Equal Opportunity Employer.

RESEARCH ASSOCIATE

The Division of Molecular Virology and Immunology, Department of Microbiology, of the Georgetown University Medical Center seeks candidates for a research position at the research associate level. Program emphasis is on the molecular biology of the human immunodeficiency virus. We require either a person with an M.S. or recent Ph.D. with training in oligonucleotide synthesis, plasmid preparation and mini-preps, sequence analysis, computer data entry, and molecular biology techniques. Salary and academic appointment are commensurate with experience and training. Send letter of application and curriculum vitae to: Dr. John L. Gerin Division of Molecular Virology and Immunology 5640 Fishers Lane Rockville, MD 20852

An Affirmative Action/Equal Opportunity Employer.

POSITIONS OPEN

POSTDOCTORAL TRAINING PROGRAM IN THE PHYSIOLOGY OF REPRODUCTION

The Center for Reproductive Physiology at the University of Pittsburgh School of Medicine has positions available for postdoctoral fellows (Ph.D. and M.D.) to obtain 2 years of advanced training in the study of reproduction in higher primates and other mammals. The program, which is supported by an Institutional National Research Service Award (NIH), the Andrew W. Mellon Foundation, and the University of Pittsburgh School of Medicine, is directed by a steering committee comprising both basic and clinical scientists. The training faculty and their research interests include: J. A. Amaco, oxytocin gene expression; B. J. Attardi, tropin mRNA regulation; R. B. Benson, neuromodulation of human reproduction; J. L. Cameron, metabolism and LH secretion; D. B. DeFranco, steroid regulation of gene expression; D. S. Gattick, clinical endocrinology and infertility; G. E. Hoffman, neuroanatomy of hypothalamic RF systems; P. A. Lee, in vitro training during differentiation and spermatogenesis in the male. Address all inquiries and requests for information to: Professor T. M. Plant, neurobiology of puberty; C. R. Poh, regulation of GnRH secretion; S. M. Pomerantz, endocrine control of behavior; K. D. Ryan, feline puberty; M. S. Smith, pineal control of LH and FSH; P. Troen, human testicular function; S. J. Winters, neuroendocrine control of testis; A. J. Zeleznik, folliculogenesis/corpus luteum.

Although applicants for NIH-supported stipends must meet NIH'S U.S. citizenship and residency requirements, such restrictions are not for fellowships. In the case of the latter, particular consideration will be given to individuals interested in the physiological basis of contraceptive development in the male. Address all inquiries and requests for information to: Dr. T. M. Plant, Ph.D., Director, Center for Reproductive Physiology, Department of Physiology, University of Pittsburgh School of Medicine, 14th Floor, Biomedical Science Tower, Pittsburgh, PA 15261.

POSTDOCTORAL FELLOW. Available immediately to study bioactivation of chlorinated solvents by methylythoxyphlic bacteria. Investigations focus on characterization of mutants and applications in treatment processes. Ph.D. is required; microbiology, biochemical engineering, or environmental sciences preferred. Please send resume and names of references to: Dr. G. Georgiou, Chemical Engineering Department, or Dr. G. E. Speitel, Civil Engineering Department, The University of Texas at Austin, Austin, TX 78712. An Equal Opportunity/Affirmative Action Employer.

POSTDOCTORAL POSITION

MOUSE DEVELOPMENTAL BIOLOGY

Position available for research into the mechanism by which the vitamin A derivative all-trans retinoic acid causes differentiation of embryonic teratocarcinoma stem cells. Research in this lab involves analysis of gene regulation during differentiation and pattern formation in embryonic development. Joint appointment with the Biological Chemistry and Molecular Pharmacology Department at Harvard Medical School. Experience in biochemical techniques, molecular biology, or mouse embryology preferred. Send curriculum vitae and a list of at least three references to: Dr. Lorraine J. Gudas, Associate Professor, Dana-Farber Cancer Institute, 44 Binney Street, Boston, MA 02115. Affirmative Action/Equal Opportunity Employer.

RESEARCH POSITION

To investigate the biochemical basis of high blood pressure and metabolic disorder, by studying the enzymes, molecular biology, and physiology of angiotensin-converting enzyme, alcohol dehydrogenase, and glutathione transferase. Methods: protein purification, recombinant expression, mutagenesis, protein and DNA sequencing, kinetics, organic syntheses, and animal research. Some Postdoc experience a plus. First-year medical students, reviewers for three junior postdoctoral fellows and technicians. M.D. or Ph.D. in biochemistry and 3 years of postdoctoral experience in methods listed above. Salary: $31,500 per annum. Send two copies of resume to: Department of Employment and Training, Special Programs, 19 Stanford Street, Boston, MA 02114. Reference: Case #00187.
The Department of Experimental Pathology, SmithKline Beecham Pharmaceuticals, is seeking an experienced Veterinary Pathologist to participate in the discovery and development of new therapeutic agents. SmithKline Beecham, a world leader in pharmaceutical research, is located in suburban Philadelphia near Valley Forge.

Successful applicants must have demonstrated ability in experimental pathology with an M.S. or Ph.D. or through publication of scientific work. Participation in the design, conduct and reporting of toxicity studies is expected as are collaborative interactions with Research Departments; investigation of pathogenic mechanisms is emphasized. A background in laboratory animal pathology is desired and board certification by the American College of Veterinary Pathologists is preferred.

SmithKline Beecham offers excellent compensation and benefits, an attractive relocation policy and a collegial work environment that offers considerable opportunity for personal and professional growth. For confidential consideration, please forward your curriculum vitae to Liz McKendry, E-141, SmithKline Beecham Pharmaceuticals, P.O. Box 1539, King of Prussia, PA 19406. We are an Equal Opportunity Employer.
Post Doctoral Research Fellowships in the Molecular Biology of DNA Viruses
At The Wistar Institute

The Wistar Institute is a center for investigating the basic molecular and biological behavior of viruses and the cells that they infect, and for exploring the molecular mechanisms of a broad range of diseases. The Institute is located on the campus of the University of Pennsylvania and is equipped with the latest biotechnology support facilities. Fellowships are available in the following areas:

Dr. D. L. Ewert: Cellular and molecular mechanisms of herpes virus augmentation of retroviral induced lymphomagenesis.

Dr. N. W. Fraser: The mechanism of Herpesvirus (HSV) latency; use of the latent HSV viral genome as a vector for expression of foreign genes in the nervous system.

Dr. B. B. Knowles: The role of the immune response in tumorigenesis in SV40 T-antigen transgenic mice; the role of HBV in hepatocellular carcinogenesis.

Dr. S. Plotkin: Mechanism of latency in CMV vectors for CMV genes that express immunizing antigens, CMV-HIV molecular interactions.

Dr. R. G. Ricciardi: Transactivation by the Ad Ela protein, MHC Class I shut off by Ela; the role of HHV-6 in lymphoproliferative disorders.

Dr. J. G. Spivack: HSV-1 latency; genetic determinants of HSV virulence; human cytomegalovirus (HCMV) latency.

Dr. R. Weinmann: Mechanisms of gene regulation at the level of transcriptional initiation by RNA polymerase II, regulation of transcription activation during adenovirus infection and teratocarcinoma cell differentiation.

Interested applicants are requested to send a curriculum vitae and the names of 3 references to: Coordinator of Research Training, The Wistar Institute, 36th & Spruce Streets, Philadelphia, PA 19104.

Applicants must be U.S. Citizens or have permanent residency status as foreign nationals at time of application. Equal Opportunity Employer, M/F.

VIRAL DIAGNOSTICS
Nucleic Acid Probes

Chiron Corporation, the leader in human hepatitis virus research, is expanding its efforts in the development of diagnostic nucleic acid probe products for the detection of hepatitis viruses and other medically important organisms. These new, sensitive and quantitative diagnostic tests will be based upon Chiron's unique probe technology.

We are seeking highly motivated and exceptional individuals at all levels to join our team. MOLECULAR BIOLOGISTS, BIOCHEMISTS, VIROLOGISTS and MICROBIOLOGISTS with experience (preferably industrial) in the characterization and application of specific nucleic acid probes and/or with a working knowledge of the methods to identify human pathogens are encouraged to apply.

Chiron Corporation, located in the San Francisco Bay Area, offers a stimulating and challenging research environment, a competitive compensation package and opportunities for professional advancement. Candidates please send C.V. and 3 references to Chiron Corporation, Human Resources Dept. - NAC89-92, 4560 Horton St., Emeryville, CA 94608.
The German Aerospace Research Establishment, DLR, invites senior level candidates to apply for the position of Scientific Director of the Institute for Aerospace Medicine (Successor of Prof. Dr. K.-E. Klein).

The Institute is concerned with biomedical/biophysical research in the fields of aerospace and underwater operations. The application-oriented work is conducted in an interdisciplinary approach, involving human physiology, medicine, biology, biophysics and psychology. The Institute has five divisions located in Hamburg with a staff of about 140 including 62 scientists. It is equipped with a number of large scale test and simulation facilities.

The Institute is expected to provide significant biostatistical contributions to the study of relevant environmental factors, like weightlessness, pressure, radiation and biological rhythms. In addition to basic and applied research, the Institute is involved in operational tasks, e.g. selection, training and medical support of astronauts and astronauts, and in user support for bioscientific research projects in space. They are conducted within national and international projects.

DLR and RWTH Aachen are seeking in a joint search procedure a personality with relevant scientific qualification and organizational experience.

Applications, in duplicate, to:
Chairman of the DLR Executive Board,
Prof. Dr. W. Knoll, Lindner Höhe, D-5000 Köln 90
or to:
Dean of the Medical Faculty of RWTH Aachen,
Prof. Dr. med. Dr. rer. nat. H. Greiling, Pauweisstraße 30, D-5100 Aachen

The Biology Department is seeking an individual to be involved in the fractionation of enzymes with various column chromatographic techniques and resins, including affinity purification schemes, applications of gel electrophoresis and of centrifugation methods; use of radioactive materials for the analysis of products of enzymatic reactions. Affinity labeling and active site titrations, enzyme kinetics and determination of kinetic parameters; and use of optical methods to assay biochemical reactions.

Requirements: Ph.D. with four years of experience in the area of enzymology and protein purification, familiarity with methods of molecular biology for protein engineering, experience with nucleic acid substrates and preferably transfer RNAs.

Interested candidates should send two copies of a cover letter and resume referencing Job No. R90-081 to: Prof. Paul Schimmel, MIT Personnel Office, Bidg. E19-239, 400 Main Street, Cambridge, MA 02139.

MIT is an Equal Opportunity/Affirmative Action Employer. MIT is a non-smoking environment.

Massachusetts Institute of Technology

 PENNSTATE College of Medicine · University Hospital The Milton S. Hershey Medical Center

Chair, Neuroscience and Anatomy

The Pennsylvania State University College of Medicine has recently undertaken a major expansion of both clinical and basic research facilities including construction of a 236,000 sq. ft. Biomedical Research Building which will be completed in 1992. As part of this expansion, the University plans to develop a DEPARTMENT OF NEUROSCIENCE AND ANATOMY and we are seeking an outstanding neuroscientist to CHAIR this department.

This individual will be responsible for establishing and guiding the new directions of this department at The Pennsylvania State University College of Medicine. The University's interdepartmental Neuroscience Program is presently comprised of basic and clinical scientists, post-doctoral fellows, and graduate students working in key areas of neuroscience. The current Department of Anatomy offers courses in anatomy and neuroscience for medical and graduate students. We are seeking a chairperson who can unify these areas and provide direction for the continued growth and development of neuroscience. Current research strengths represented include: molecular neurobiology, neuroanatomy, neuroparmacology, neurovirology, brain-behavior relationships and neural control of autonomic function.

The Chair will have the opportunities to develop new areas and recruit additional faculty. The University is committed to building a leading Department of Neuroscience and Anatomy and this international search is evidence of that effort.

The deadline for receipt of applications is September 30, 1990.

Nominations or applications should be sent to:
Julien F. Biebuyck, M.B., D.Phil., Chairman, Search Committee for the Chair of Neuroscience and Anatomy, The Pennsylvania State University College of Medicine, P.O. Box 850, Drawer SC, Hershey, PA 17033, U.S.A.

An Affirmative Action/Equal Opportunity Employer. Women and Minorities are Encouraged to Apply.
POSTDOCTORAL RESEARCH ASSOCIATE. M.D. and M.S., or Ph.D. background necessary in electron microscopic immunocytochemistry, histochemistry, and immunocytochemistry, or related fields. Patient and tissue material will be analyzed using monoclonal antibodies and immunocytochemistry. The applicant will engage in research designed to test potential applications of the new technology, including the potential use of this technology in the diagnosis and treatment of diseases. The position is available immediately. Send a current curriculum vitae and a letter of interest to: Dr. Robert Pease, Department of Pathology, University of California, San Francisco, 505 Parnassus Avenue, San Francisco, CA 94143. Filing deadline: 1 September 1990. UCSF is an Equal Opportunity/Affirmative Action Employer.

POSTDOCTORAL POSITIONS. In neurobehavioral pharmacology; one available immediately and one available in early 1991. Applicants must have a Ph.D. and postdoctoral experience in brain neurotransmitter systems. Experience in in vivo microdialysis and other neurochemical approaches is desirable. Send a current curriculum vitae, three reference letters, and a cover letter to: Dr. John P. Henning, Department of Pharmacology, Stanford University, Stanford, CA 94305. Filing deadline: 30 June 1990. Stanford University is an Equal Opportunity/Affirmative Action Employer.

RESEARCH SCIENTISTS. The Biophysics and Biocomputer Science Division of the National Institutes of Health is seeking applications for up to three postdoctoral positions in the areas of biophysics and computer science. Experience in molecular biophysics, computer science, or a related field is desirable. Applicants should have a Ph.D. in biology, chemistry, or a related field. Salaries range from $28,000 to $35,000, depending on qualifications. Positions available immediately. Send a current curriculum vitae, a list of publications, and the names and addresses of three references to: Dr. Elizabeth R. Smith, National Institutes of Health, Building 10, Room 1G04, Bethesda, MD 20892. Tel: (301) 496-7194. Bethesda is an Equal Opportunity/Affirmative Action Employer.

RESEARCH ASSOCIATE. The National Institute of Environmental Health Sciences is seeking a research associate to participate in a project to examine the effects of various environmental factors on the development of cancer. The position is available immediately. Send a current curriculum vitae and three reference letters to: Dr. John P. Henning, Department of Pharmacology, Stanford University, Stanford, CA 94305. Filing deadline: 30 June 1990. Stanford University is an Equal Opportunity/Affirmative Action Employer.
A Senior Executive Service Vacancy

ASSOCIATE CHIEF
Positron Emission Tomography and Radiochemistry

The Associate Chief, Positron Emission Tomography (PET) and Radiochemistry, has responsibility for administering a very large intramural program of basic and applied research in the broad fields of PET including radiopharmaceutical development and production to identify biochemical abnormalities in various diseases and normal biochemistry relevant to humans. The research program operates with an annual budget of $3 million and requires a staff of approximately 30 professional, technical and administrative staff with an additional 20-25 senior investigators from five participating Institutes.

This is a Civil Service position in the Senior Executive Service (SES) with an annual salary between ES-1 through ES-4 (currently $71,200 to $79,200 per annum) depending upon the qualifications of the applicant. The applicant selected for the position must join the SES. The individual selected, if not presently in the SES, must serve a one-year probationary period. (Applicants alternatively may be eligible for appointment in the Commissioned Corps of the U.S. Public Health Service.)

Applicants must meet the minimum educational requirements for Research Chemist, GS-1320. Applicants must also meet established mandatory professional/technical and managerial/executive requirements. Applicants will be further evaluated on the degree to which they possess additional desirable qualifications in the areas of professional/technical experience, training and education, and honors and awards. A copy of the requirements may be obtained by contacting Ms. Sharon Reed in the Clinical Center Personnel Office, on (301) 496-6895.

Applications for Federal Employment (SF-171) are to be sent to: Ms. Reed, The Clinical Center, National Institutes of Health, Building 10, Room 1N312, 9000 Rockville Pike, Bethesda, Maryland 20892. A current curriculum vitae and bibliography must accompany all applications for entrance into the SES. Resumes are not acceptable applications for entrance into the SES. Public Health Service Commissioned Officers wishing to enter the SES must follow the above procedures. Officers interested in applying for the position within the Commissioned Corps may submit a resume to the above address.

Applications must be received by: July 6, 1990.

Selection for this position will be based solely on merit, with no discrimination for non-merit reasons such as race, color, religion, sex, national origin, politics, marital status, physical or mental handicap, age, or membership or non-membership in an employee organization.

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STAFF SCIENTISTS & POSTDOCTORAL FELLOWS

Neurobiology & Molecular Biology

Regeneron Pharmaceuticals, a company dedicated to developing therapeutic agents for degenerative and traumatic neurological diseases, is seeking to apply recent advances in the understanding of neuronal growth and regeneration.

Regeneron offers an exciting, collegial environment in which state-of-the-art molecular skills are brought to bear on outstanding problems in neurobiology and medicine. Key projects focus on the discovery, purification and molecular cloning of novel neurotrophic growth factors, and on the assessment of their biological roles as well as therapeutic potentials using innovative cell culture methods and animal models.

Positions in Neurobiology require expertise in the areas of:
- Neural Regeneration (PNS/CNS)
- Models of Neuronal Disease

All positions in Neurobiology require a strong neuronatonical background. Experience with receptor autoradiography and/or in situ hybridization is desirable.

Additional openings in Molecular and Cell Biology require skills in the areas of:
- Protein Biochemistry
- Mammalian Expression Vectors
- Molecular Genetics
- Monoclonal Antibodies

Regeneron's modern facility is located on a 275-acre wooded campus in Westchester County, 20 miles north of Manhattan, near major universities and medical centers. We offer excellent compensation packages, including generous stock options. Suburban Westchester features attractive and affordable housing, outstanding public schools and recreational facilities along with ready access to the cultural and business centers of New York City.

Please forward your resume, in confidence, to: Ms. Carol Deaken, Regeneron Pharmaceuticals, Inc. 777 Old Saw Mill River Road, Tarrytown, NY 10591-6706. Equal opportunity employer.

REGENERON Pharmaceuticals, Inc.
New education books from AAAS

**Assessing Higher Order Thinking in Mathematics**
Edited by Gerald Kulm

Teaching higher order thinking is essential in today's world. And what is taught must be tested. Unfortunately, most mathematics tests focus primarily on rote computational skills and memorized facts rather than on higher order thinking. This book addresses such concerns. The authors explore new approaches to mathematics assessment, provide directions for reforming mathematics testing, and give examples of innovative test items. It is especially valuable for teachers, test publishers, researchers, and federal and state educational policy makers.

**Topics include:** A new world view of assessment in mathematics; power items and the alignment of curriculum and assessment; assessing student growth in mathematical problem-solving; computer-based mathematics assessment; calculators and mathematics assessment; students' theories about mathematics and their mathematical knowledge; assessing schema knowledge for arithmetic story problems; critical evaluation of quantitative arguments; investigation of structured problem-solving items; and new directions for mathematics assessment.

1990; 216 pp.; indexed
#89-27S - softcover; $24.95
(AAAS members $19.95)

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**The Liberal Art of Science**

**Agenda for Action**

This report presents the conclusions and recommendations of the AAAS Project on Liberal Education and the Sciences. It discusses the level of scientific understanding necessary for optimal participation in 21st century life and the type of undergraduate science education required to achieve such a level of understanding. In addition, this volume supports the idea that science is a liberal art and should be taught as such. It recommends goals for liberal education in the sciences, outlining the multidisciplinary curriculum and teaching strategies necessary to achieve them.

An appendix includes descriptions of existing courses and programs, offered at institutions nationwide, that are consistent with the project's recommendations. This report is of particular interest to undergraduate science educators as well as to all people committed to quality science education.

**Topics include:** Agenda for action; faculty responsibility; resource commitment; teaching materials and technologies; assessment instruments; the nature of scientific explanation; historical context; pedagogical techniques; integrating multidisciplinary content; programmatic approaches to liberal education in science; and liberal education for special groups such as future science teachers, the underrepresented in science, people with disabilities, and science and engineering majors.

1990; ca. 130 pp.
#90-13S - softcover; $12.95
(AAAS members $10.30)

Order from: AAAS Books, Dept. A4, P.O. Box 753, Waldorf, MD 20604 (FAX: 301-843-0159). To order by phone (VISA/MasterCard only), call 301-645-5643 (9am-4pm ET) and ask for AAAS. Individuals must prepay or use VISA/MC. For institutional purchase orders, add $3.50 postage/handling. Please specify item #, and allow 2-3 weeks for delivery. For shipments to CA, add applicable sales tax.

American Association for the Advancement of Science
POSTDOCTORAL FELLOWSHIP
GASTROINTESTINAL PHARMACOLOGY

MARION MERRELL DOW INC.
KANSAS CITY, MO

Marion Merrell Dow Inc. is seeking applications for a postdoctoral fellowship in gastrointestinal pharmacology to be located at Kansas City, MO site. The area of research will focus on aspects of intestinal motility and its regulation. Applicants must possess a Ph.D. degree in pharmacology, physiology, or biochemistry with a strong emphasis on gastrointestinal motility. This 2-year fellowship is supported by a competitive salary and benefits package.

Qualified applicants are asked to send a current CV including a list of publications, the names, addresses, and phone numbers of 3 references, and a short statement of career goals to:

Ms. Nancy Paul
Human Resources Representative
MARION MERRELL DOW INC.
P. O. Box 9627
Kansas City, MO 64134

Equal Opportunity Employer

DIRECTOR, CARDIOVASCULAR RESEARCH

The Upjohn Laboratories Division of The Upjohn Company, a worldwide leader in pharmaceutical research and development, is seeking a Director to lead our Cardiovascular Diseases Research Unit as well as maintain their own active research effort. The successful candidate will be responsible for directing a multidisciplinary research group comprised of 50-60 individuals whose efforts are focused on the pharmacological control of cardiac ischemia and rhythm, development of novel antihypertensive therapies and regulation of thrombosis and hyperproliferative responses of vascular smooth muscle. Furthermore, this unit provides cardiovascular support and expertise to other drug discovery programs for compounds undergoing preclinical and clinical evaluation.

Qualified applicants will possess:
- A Ph.D. and/or M.D. degree with an established record of scientific excellence in cardiovascular research as evidenced by publications and/or patients
- Commitment to drug discovery and development
- Managerial experience and excellent communication skills

Upjohn offers a competitive compensation and benefits package in addition to a stimulating, multi-disciplinary research environment at our modern laboratories in Kalamazoo, Michigan. In 1989, Upjohn committed over $400 million to research and development and is currently increasing its main research facility by 50%. Qualified and interested applicants are invited to forward their cv/resume to: THE UPJOHN COMPANY, CORPORATE RECRUITING, KALAMAZOO, MI 49001-9988. Refer to position number 5693-HA in your cover letter. An Equal Opportunity Employer M/F.

Our Commitment to Scientific Excellence Continues...

Ph.D. Senior Scientist In Behavioral Pharmacology

An opening is available in the Central Nervous System Group in Pharmaceuticals Research for a Ph.D. Behavioral Pharmacologist. This position provides a challenging opportunity to lead a team of research scientists in a multi-disciplinary drug discovery program. In addition to their own research responsibilities, this person will supervise several Ph.D. scientists engaged in drug discovery efforts directed toward the treatment of central nervous system disorders. The ideal candidate should have demonstrated skills in experimental psychology (with an especially strong focus on animal models of learning and memory) and evidence of supervisory skills and the ability to work in a team environment.

You will find a highly stimulating scientific environment in a modern research facility located near Wilmington, Delaware. We offer excellent compensation and benefits, including relocation. Our mid-Atlantic location offers an attractive lifestyle with easy access to a wide range of academic, cultural, and recreational activities. Interested candidates should send their resumes and references to Employee Relations Department, Room PSS-0014, Du Pont Company, Wilmington, Delaware 19898.

An Equal Opportunity Employer
RESEARCH ASSOCIATE. We are seeking an individual with research experience in mechanisms of human airway inflammation to develop a new research direction which will focus on the role of indoor air pollution and allergens. The position provides a unique opportunity for a creative scientist to work independently and in collaboration with a multidisciplinary team of investigators in biomedical and related fields. Preference will be given to individuals with a Ph.D. in biochemistry or related areas. Experience in airway biology and immunologic approaches to study mediators including neuroendocrine substances and cytokines involved in the inflammatory/allergic reaction is required. The appointment is for 1 year, renewable if funding is available. Salary and fringe benefits are commensurate with education and experience. Interested applicants should send curriculum vitae, statement of research interests and past research accomplishments, and three referees to: Dr. Helil Koren, Center for Environmental Medicine and Lung Biology, University of North Carolina School of Medicine, CB #7030, Medical Research Building C, Chapel Hill, NC 27599. Affirmative Action/Equal Opportunity Employer.

ASSOCIATE SCIENTIST (Physicist). Conduct research and development of a new class of metallic thin films and rare earth-based detectors for nuclear biology. Develop magnetic and magnetooptic detector readouts, cryogenic and VLSI detector technologies, data acquisition system and software. Perform cryogenic tests in millikelvin temperature supervisory system. Five years required. Must have Ph.D. in physics and experience in low-temperature technologies. Must have experience in low-temperature physics, III-V compounds (GaAs), magnetic measurements, modern electronics, and spectroscopy. Requires a 40-hour work week at $49,920 per year. Mail résumé and copy of ad to: DEED, 1100 North Eutaw Street, Room 212, Baltimore, MD, 21201. Job #94-14231. Job location: College Park, Maryland. Proof of legal right to work in the United States required.

RESEARCH SCIENTIST POSITIONS (2). Available immediately for studying metabolism of chemical carcinogens in mammalian, fish, and bacterial systems. Ph.D. in biochemistry, biorganic chemistry, medical school, pharmacy, or related field required. Experience in isolation and structural identification of metabolites preferable. The positions provide an opportunity for developing a program of candidate’s interest. Please send résumé and names of three references to: Dr. H. Silka, Director, Division of Environmental Toxicology and Chemistry, Center for Environmental Research, State University of New York at Buffalo, 1200 Elmwood Avenue, Buffalo, NY 14225. Telephone: 716-878-5422.

RESEARCH SCIENTIST who will plan and perform in vivo and in vitro studies on gene activation by estrogen receptors. Experience in cellular and physical methods of reproductive biology, tissue culture, and all major areas of recombinant DNA methodology. Small animal handling and use. Supervise/train all levels of technicians and students. Maintain/repair major items of laboratory equipment. Organize/write up results for publication. Ph.D. degree in biochemistry, 3 years of postdoctoral training and 1 year of research experience in molecular endocrinology. Forty hours per week; $32,748 annual salary. Contact: Texas Employment Commission, Houston, Texas, or send résumé to: Texas Employment Commission, Placement Unit, TEC Building, Austin, TX 78778. J.O. #5517775. The University of Texas is an Equal Opportunity Employer. Women and minorities are encouraged to apply.

SURGICAL RESEARCHER. The Department of Surgery at The Mari Imogene Bassett Hospital, a major teaching affiliate of Columbia University, is seeking a Ph.D. to conduct basic surgical research in an area of general surgery. Laboratory space and initial budget is competitive with other major medical centers. The position includes a fine benefits package and academic appointment. Located in Cooperstown, New York, a rural four-season resort village with unique natural and cultural opportunities. Reply: Michael S. Gold, M.D., Surgeon-in-Chief, The Mary Imogene Bassett Hospital, Cooperstown, NY 13326. Telephone: 607-547-3968 or Thomas A. Pearson, M.D., Ph.D., Director, Research Institute, The Mary Imogene Bassett Hospital, Cooperstown, NY 13326. Telephone: 607-547-3045.

SITUATIONS WANTED

AMBIDENT浦.D. MOLECULAR BIOLOGY (1986), seeks administrative/managerial position. Experience includes interaction with marketing staff, technical support, and laboratory management. Box 50, SCIENCE.

INSECT BIOCHEMIST: Ph.D. entomology, M.S. biochemistry; 10 years of HFLC: enzymes, hormones, antibiotics; Lepidoptera, Diptera; Macintosh. Seeks permanent position. Box 48, SCIENCE.

NEUROCHEMIST/CELL BIOLOGIST, Ph.D., 5 years experience: neuronal development, TEM, SEM, protein chemistry, SDS-PAGE, immunocytochemistry. Seeks R&D government/industry. Box 51, SCIENCE.

MEETINGS

VTH INTERNATIONAL SYMPOSIUM ON AMYLOIDOSIS 5 TO 8 AUGUST 1990/OSLO, NORWAY

The scientific program will deal with all aspects of amyloid proteins, amyloidosis percursor, and amyloidosis. Please contact: Professor J. B. Narvig, Department of Immunology and Rheumatology, Fr. Gytes 1, N-0172 Oslo 1, Norway. Telephone: +47-22-15-10. FAX: +47-22-70-87.

COURSES AND TRAINING

POSTDOCTORAL POSITIONS IN AGING AND CELL GROWTH CONTROL. Boston University School of Medicine announces the availability of postdoctoral fellowships for studies on the effects of aging on gene expression and cell growth control. Training faculty include Judy Campisi (oncogene expression in late passage diploid breast cells), Deborah Dobson (adipocyte differentiation). Barbara Gilchrest (fibroblasts and keratinocytes from elderly donors); and Richard Miller (signal transduction in T lymphocytes). For further information, contact: Richard Miller, Boston University, 80 East Concord Street, Boston, MA 02118. Please include current curriculum vitae and list laboratory (or laboratories) of particular interest.

POSTDOCTORAL POSITIONS IN IMMUNOLOGY. Boston University announces the availability of postdoctoral fellowships for studies in cellular and molecular immunology. Training faculty include David Keller (macrophage function), Paul Black (AIDS; psychoimmunology), David Center (CD4 signaling and HIV), Murat (macrophages), Shyam Te Ju (cytotoxic T cells), Elinor Levy (HIV and T cell colonies), Ann Marshak-Rothstein (autoimmunity in murine lupus model), Tom Rothstein (B cell activation; Jackie Sharor (T cell genetic engineering), and Gail Sonenschein (c-myc gene expression). For further information, please contact: Richard Miller, Boston University, 80 East Concord Street, Boston, MA 02118. Please include current curriculum vitae and list laboratory (or laboratories) of particular interest.

MARKETPLACE

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The Geneva molecular biology research institute of one of the world’s most successful healthcare groups is recruiting a

CELLULAR IMMUNOLOGIST

to investigate the role of adhesion molecules in inflammation

The successful applicant will have a leading role in an expanding research group of molecular biologists, biochemists and cell biologists working in this field. The ideal candidate will have several years of relevant experience and a proven track record of research in cell biology or cellular immunology.

The Glaxo Institute for Molecular Biology carries out long term research to support the company-wide effort to discover effective new medicines. It provides a dynamic research environment, and encourages the publication of scientific results as well as collaborative projects with academic groups.

We offer an excellent salary and benefits package and opportunities for career development in one of the most attractive parts of Europe.

If you are interested in this position, please send your Curriculum vitae with a list of publications and the names of three referees to: Rita Gloor, Personnel Manager, GLAXO IMB S.A., 46, route des Acacias, 1211 Geneva 24, Switzerland.

ENDOWED CHAIR

CHAIRMAN, NEW GENETICS DEPARTMENT

St. Jude Children’s Research Hospital, a private research institute, is creating a new Department of Genetics. The chairperson will be expected to direct an internationally recognized research program in contemporary genetics and will shape the future of genetics research within the institution through new faculty recruitment and by contributions to its overall scientific leadership. The Department of Genetics will be located in a new 240,000 square foot research building to be completed in early 1991, which will also accommodate ongoing basic science programs in Virology and Molecular Biology, Biochemistry, Immunology, Pharmacology, and Tumor Cell Biology, leaving ample space for further future expansion. The Chairman’s salary will be provided through committed endowment funds, together with additional resources commensurate with the needs of a dynamic and ambitious individual. Opportunities exist to interact with strong clinical programs in pediatric Hematology/Oncology and Infectious Disease. Applicants should submit a curriculum vitae and the names and addresses of four references to:

James N. Ihle, Ph.D.
Chairman, Department of Biochemistry
St. Jude Children’s Research Hospital
332 North Lauderdale
Memphis, Tennessee 38105

St. Jude Children’s Research Hospital is an Equal Opportunity Employer
Perfect Match™ polymerase enhancer* is an additive formulated to greatly increase the specificity of primer extension reactions (1,2). Primer-template complexes that contain mismatched nucleotides near the 3' terminus of the primer are destabilized by Perfect Match polymerase enhancer (3). However, perfect and near perfect template-primer matches or primers with regions of non-homology at the 5' end are not affected. Thus, the frequency of false priming events is dramatically decreased. Perfect Match polymerase enhancer may be used to minimize false priming events in such applications as cDNA synthesis and primer extension reactions including those involving PCR amplification (4).

Figure 1 shows two examples of in vitro amplification reactions that are significantly enhanced by the addition of Perfect Match polymerase enhancer to the polymerase preparation. Note that in lanes 1 and 2, the desired PCR product cannot be detected unless Perfect Match polymerase enhancer is added to the amplification reaction. In lanes 3 and 4, Perfect Match polymerase enhancer not only increases the intensity of the desired amplification products, but dramatically reduces the background artifacts generated by non-specific priming events.

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*Patents Pending
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