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Large-scale genome sequencing has resulted in the deciphering of the complete genomes of many species and has opened the door to a new biological discipline referred to as

data mining, or analytic applications. The microarray analysis has become a routine technique for probing various tissues for gene expression patterns. Analysis of large data sets like those obtained from microarray experiments requires powerful software that can import, process, and analyze the information for its statistical significance. Once significant changes in gene expression have been established, the investigator likely wants to visualize, reanalyze, shuffle, cluster, or otherwise make sense of the information.

Spotfire DECISIONSITE 7.0 offers a module specialized for the analysis of functional genomics data. The software is installed either locally or through the Internet, and it runs on Windows 98 or higher. Gene expression analytics is done in two major steps. First, raw data must be imported into the software, normalized, and statistically evaluated. A second step allows for visualizing the data. In many respects, the first step of data import and statistical analysis is the most critical part of the analysis. DECI-SIONSITE allows one to either use the software-provided import and analysis functions or use tailor-made algorithms made with S+, Java, or Perl scripts. Import of data from Affymetrix, Genepix, or GEML files is simple. The normalization process allows a user with specific needs to customize the process. DECISIONSITE will show the algorithms used for analyses, such as for data normalization or data import. Both the online help function and the handbook are great resources.

DECISIONSITE offers two- and three-dimensional plots that can be rotated and viewed in all dimensions. Users can cluster genes from the array by the similarity of their expression profiles. The software allows one to choose between a number of similarity searches, such as Euclidean distance or Pearson's correlation. Genes can be clustered, for example, by hierarchical or Kmeans clustering and arranged in a dendrogram. Potential candidate genes can then be saved in "portfolio" folders.

Because the contents of the graphs are "live," clicking on individual data points lets the user instantly see the name of the corresponding gene of interest and view it independently. DECISION-SITE also allows for import of individual columns of data, e.g., from Excel files, into its working spreadsheet. Annotations from databases, such as GenBank, can thus easily be added, allowing even more information to be viewed during manipulation. Once interesting patterns have been detected, the corresponding graphs or gene lists can be directly exported into Microsoft PowerPoint, Word, or Excel files or posted on the Web. The latest version of the software (7.1) adds Windows XP compatibility.

—Andreas Madlung

Department of Botany, University of Washington, Seattle, WA 98195, USA. E-mail: madlunga@u.Washington.edu

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CONTINUED ON PAGE 2282

liquid handling, and analysis. The platform consists of the Applied Biosystems Proteomics Solution System Mass Spectrometer System, the PerkinElmer Life Sciences' MultiPROBE II Robotic Liquid Handler, and Millipore's Montage In-Gel Digest 96 Kit. The Multi-PROBE II robotic liquid handling system rapidly and efficiently manipulates the components of the Montage In-Gel Digest96 Kit for automated preparation of protein samples and subsequent spotting onto Applied Biosystems matrix-assisted laser desorption ionization targets. The kit includes everything needed to digest 384 samples, including prepared reagents, enzymes, and four low-binding 96-well filter plates. The vacuum-based protocol minimizes pipetting, reduces the number of transfer steps, and decreases the chance of sample loss.

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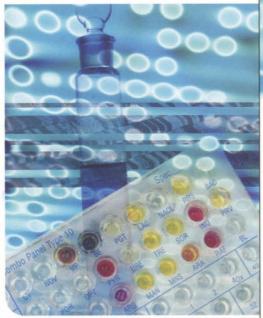


European Careers

THE STOCKHOLM-UPPSALA BIOREGION

by Peter Gwynne

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Activities in the Stockholm-Uppsala region have played a powerful role in Sweden's emergence as a major player in commercial life science. The region's secret: its academic institutions have formed effective links with its large and small firms.

During the past decade, Sweden has emerged as a global power in life science in general and biotechnology in particular. More than 200 biotech firms put the Nordic nation of 9 million people in fourth place in Europe for the absolute number of such companies and first in the world in terms of biotechnology firms per capita. Those figures will only get better. While the number of biotech companies in Europe is growing at an annual rate of 12 percent, Sweden's commercial biotechnology sector is expanding by about 34 percent yearly.

The growth stems in large measure from collaborations between academic organizations and industry that have created a growing number of startups and a steady stream of life science graduates with the skills to staff them. The reasons for the collaborations: global trade and opportunities to convert research into beneficial applications. "For Sweden to be competitive in medical research and industry, we need a very dynamic interaction between academic and commercial life. Otherwise we have no chance to compete with the United States," says Jan-Åke Gustafsson, professor and chair of the Department of Biosciences at Stockholm's Karolinska Institute. "Also, as medical scientists we have almost a moral duty to interact with industry. The genomic revolution has made it possible to go from lab work to treating patients in just a few years."

The Stockholm-Uppsala Bioregion, which includes the two cities to the south and north of the Swedish capital's international airport, has played a major role in that output. Links between the region's universities, hospitals, established biopharmaceutical companies, and startup biotechnology firms have created an environment that encourages enterprise and growth. The region houses more than 400 life science companies. That sum includes half of the biotechnology firms in Sweden and over 50 percent of the country's health care companies.

That commercial success rests on a particularly strong foundation of academic research. "We have five universities—a critical mass," says Karolinska Institute's president Hans Wigzell. "The articles on biotechnology coming out of the area are enough to match any in Europe."

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THE STOCKHOLM-UPPSALA BIOREGION



ACADEMIC ACHIEVEMENT

Sweden's newly prominent position in life science builds on a long history of research that has found significant application. "It goes back to the 1920s with the invention of the ultracentrifuge in Uppsala," says Matthias Uhlén, professor of microbiology at Stockholm's Royal Institute of Technology (known by the Swedish acronym KTH). "This tradition of developing tools for life

science continued through the 1960s and 1970s; ELISA is a Swedish method. Swedish company Biacore used the biochip at least 10 years before anyone else in the world. And the human genome project was done on an Uppsala instrument."

Three other factors have encouraged the growth of commercial life science. First, despite outsiders' perceptions, the Swedish government has long supported industry. "We've always had very low company taxation although rather punishing taxes if you want to be personally rich," Wigzell says. "The government has always encouraged starting companies."

The second factor might also surprise outsiders. "We have always had good collaboration between universities and industry," says Wigzell. "As a company we have had very strong links with the universities since the 1950s," adds Per Erik Sandlund, president of Swedish holding for Amersham Biosciences. "There is a great deal of comfort between the industrial sector and academia."

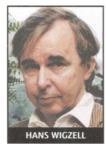
Third, the country also has a tradition of trading. "Sweden is so small that even our rather small businesses have been forced to work outside our home market," explains Ove Öhman, executive vice president of Uppsala company Åmic AB. "The fact that we have a tradition of global markets means that we have an established work force that can handle all the different issues involved in globalization." Some members of the scientific work force have significant overseas experience. "We have had a very open atmosphere in which a lot of Swedish postdocs ended up in the United States and the United Kingdom," says Maris Hartmanis, president and CEO of Gyros, another Uppsala startup. "So Swedish scientists have quickly adapted to what is around them."

AGONY AND ECSTACY

That adaptability showed itself to greatest advantage 10 years ago. Ironically, the event that stimulated the present boom in the Stockholm-Uppsala bioregion appeared initially as a disaster. Pharmacia, a local pharmaceutical giant with strong, longstanding links to Uppsala University, merged with global pharma Upjohn. The merged company moved much of Pharmacia's research out of Uppsala, leaving several prominent managers and scientists in a corporate limbo. Many decided to leave the company and stay in the region. That meant a critical mass of experienced individuals ready to take key roles in a group of startup biotechnology companies that was emerging to exploit the results of research at Uppsala University and other local academic institutions.

"Everything was ready at the Pharmacia consolidation. There were plenty of experienced managers," says Uhlén of the KTH. "The agonizing departure of Pharmacia has been a positive thing," says Karolinska's Wigzell. "In the Stockholm-Uppsala region now there are more life science employees than ever before."

Even today the ghost of Pharmacia refuses to go away. In 1997 the company linked up with Uppsala University to set up a Center for Surface Biotechnology on the university campus. "It was set up to function as a catalyst for corporate interaction," says Karin Caldwell, who had helped to stimulate the idea while working at a center of excellence connected with the University of Utah in the United States and who became head of the Uppsala center in 1998. Amersham Biosciences, which was created in a merger with the Uppsala-based biotechnology division of the old Pharmacia five years ago, also maintains a strong presence in Uppsala. Since then, says Sandlund, "The R&D area has been one of the fastest growing. In 1997 we had about 200 people in R&D. Now we have more than 300. The growth will continue in the future."



NEW WINDS BLOWING

Uppsala's uprising was just one factor in the flowering of commercial life science in the Stockholm-Uppsala bioregion. Academic institutions in Stockholm played their own roles. "In the later part of the 1990s we were influenced by the new winds blowing through Europe to leverage intellectual property and scientific research by spinoffs," says KTH's Uhlén. "About 10 companies

started from the Institute, including about seven from our group." Uhlén's group "has been extremely oriented toward industry," agrees Torben Jørgensen, CEO of biotechnology startup Affibody. "They like to see their work put into application."

Founded in 1998 in Bromma, near Stockholm, Affibody represents a typical example of Sweden's new attitude to startups. "All 13 of our founders came from the Royal Institute of Technology or the Karolinska Institute," says Jørgensen. "We have increased our staff from 11 to 66 in six months. We started as a technology platform company. Now we are streamlining into a product company."

The Karolinska Institute played an equally significant part in stimulating Stockholm's biotechnology boom. Karo Bio, a company originally spun off from Karolinska in 1987, went public 10 years later. "This was the first illustration of a concept that we are still trying to realize," says Gustafsson. "The best way to have academic-industrial interactions is to use a three-step rocket. It starts with an academic group, then becomes a small or medium size spin-off company, and then, well off the campus, a big pharma. The spin-offs develop a certain skill, identifying academic results that they can develop further in an industrial context. They can then make the programs that they can sell into big pharma through partnerships. The small companies act like advance technology transfer offices. This brings in a maximum gain for the scientists and the science in terms of research grants."

INFRASTRUCTURE FOR INDUSTRY

Stockholm's two major academic institutions had already set up the infrastructure necessary for industrial biotechnology to bloom. "Our group at the Royal Institute had licensed about 45 patents to big companies since the 1980s," recalls Uhlén. "I have been vice president at the university responsible for technology transfer. I have tried to push more professional aid to scientists working at KTH." The aid included the creation on campus of a technology park described as one of the 10 largest in the world.





Karolinska set the stage for its spin-off activity in 1990, when it started to build the Novum Research Park. The initial structure, with about 500,000 square feet of floor space, contained four of Karolinska's life science departments, Karo Bio, and other commercial activities. "There's no doubt that Novum was way ahead of any other activity in Stockholm," says Gustafsson.

Since 1996, when Karolinska was allowed to

start its own technology transfer company, KIAB, development has accelerated. A new company is now emerging from the institute every other month. The chief hot spot for these activities is the major campus in the northern part of Stockholm, with Karolinska Hospital, KTH, and Stockholm University in close proximity. Karolinska has also linked up with KTH and Stockholm University to create Stockholm BioScience, using parts of the old North Station railway yard for this purpose. Current plans envision that construction of this billion euro (US\$980 million) center for research and production in life science will start by 2006. Once complete, the development will accommodate up to 200 companies and roughly 8,000 employees.

Karolinska Institute is also investing heavily in its south campus. Huddinge University Hospital is also at that location, and a new college, Södertörns Hogskola, is on its way to become a fully fledged university. "We have helped them to set up a strong faculty of medical sciences, emphasizing postgenomics work," Gustafsson says.

The next step is Novum BioCity, an expansion of Novum Research Park with an emphasis on multidisciplinary research and close collaboration between academia and small- and medium-sized companies modeled on Karo Bio's example. The BioCity will start to operate in 2004.



UNIVERSITY-INDUSTRY LINKS

Another key factor in the move to industrial biotechnology involved legislation. In the early 1990s the Swedish government voted a "teacher's exemption" that gives all rights to intellectual property created by academic researchers to the individual scientists rather than the departments for which they work. As a result, says KTH's Uhlén, "a lot of the spin-offs

haven't involved the universities."

They did, however, need money to get started. The arrival of a viable financing system was the final item that helped to create today's commercial bioregion. "The emergence of a venture capital structure was a most important driving force," says Gyros's Hartmanis.

While they may not have rights to intellectual property developed in their laboratories, universities in the Stockholm-Uppsala Bioregion have a large stake in the commercial success of spin-offs created by their researchers and of older life science companies in the region. "Universities see a great asset in having links and collaborations with industry," says Sandlund of Amersham Biosciences. "They can attract more students that way.

Those links extend to adjusting the education that life science departments offer. "We're sending our graduates to the spin-off companies," explains Karolinska's Gustafsson. "Being in the same place, we can adapt

INTERNATIONAL OUTLOOK

As companies in the Stockholm-Uppsala Bioregion start to recruit more heavily from overseas, the Karolinska Institute has already been there and done that. "Our international sector is the most rapidly increasing area that we have. We have the highest proportion of foreign students in Scandinavia," says president Hans Wigzell. "One-third of M.D.-Ph.D.s here come from abroad. What we're doing is global just as medicine is global."

The Institute has focused particularly on Singapore. "We have special exchange programs for doctoral students and others in Singapore," Wigzell says. "We have collaborative projects in genomics, dentistry, oncology, and other fields. And we have discussed starting a special unit in Singapore."

The southeast Asian city state isn't alone in attracting Karolinska's interest. "On the campus we have an office of the Japan Society for Promoting Science," Wigzell says. "We have also started to share a graduate student program in neurology with the National Institutes of Health in the United States. And we funnel our African programs through Uganda."

The interest has produced a significant quid pro quo. "Support for the Karolinska Institute from industry abroad," Wigzell notes, "has gone up over 500 percent in recent years."



and tailor their education. By keeping the education and practical work close together, we can have them cross-fertilize and let the education develop dynamically to include topics such as legal and ethical issues."

Science educators don't cater only to startup companies. "We encourage the universities to set up courses to ensure our supply of scientists and engineers," says Lars Hagel, who oversees external

R&D collaboration for Amersham Biosciences. "The universities are very responsive. For example, Uppsala University has just started a new line in engineering education in the area of bioinformatics."

KTH, meanwhile, has recently set up a series of five-year programs on engineering for biotechnology. "These programs, roughly equivalent to an American Master's degree, have been able to attract absolutely top students—people who might otherwise be going to business school or law school in the U.S.," says Uhlén. "We will see an outpouring of graduates in the next year or two. That will be an asset for us here."

Karolinska makes its contribution through its Center for Medical Innovations. This organization offers training courses and Ph.D. programs focused on commercial biotechnology, oversees incubators for startup firms, and takes responsibility for the Stockholm BioScience project.

PRACTICAL EXPERIENCE

Uppsala University sets out to give undergraduates practical experience in research for industry. "Local industry commissions us to do projects such as pilot plant development. Small companies use us as a factory

CONTINUED ➤





We are proud to note that biotechnology has many of its roots at Uppsala University. Pioneering methods like ultracentrifugation, electrophoresis, gel filtration, and affinity-chromatography were invented by scientists at our university. Strong industrial development started in the Uppsala region in 1950 with the scientific collaboration between Pharmacia and Uppsala University. Today, ongoing research in areas like gene technology, surface biochemistry, micromechanics and molecular engineering in close collaboration with industry at home and abroad continues to make our region the most active area for biotechnology in northern Europe.

The Uppsala region hosts companies like Amersham Biosciences, Biacore, Gyros, Personal Chemistry, Pharmacia Diagnostics, PyroSequencing, Q-Med, Quintiles and Åmic.

Uppsala University, founded in 1477, is more vigorous than ever.

Welcome to join us!

Uppsala University Box 256 SE 751 05 Uppsala

Plant Adaptation in Natural Populations

Uppsala University aims at strengthening its research profile in plant science at the interface between functional genomics, molecular genetics, and ecology. Applications are therefore invited for one full and one associate professorship.

Chair in Evolutionary Functional Genomics

at the Evolutionary Biology Centre (UFV-PA 2002/4292)

This full professorship is intended as the leading position of a new research program at the centre.

Senior Lecturer/Associate Professor in Biology

esp Physiological Botany at the Evolutionary Biology Centre (UFV-PA 2002/4293)

The Evolutionary Biology Centre was established at Uppsala University in 1999 to integrate and strengthen research and education in biology in general and in evolutionarily oriented areas in particular. There are 13 research programs within the centre, including programs in ecology, genetics, systematics and molecular evolution. In total, the centre has some 450 researchers and graduate students, and thus offers excellent conditions for interactions across disciplines.

For further information about the positions, please contact the Dean of Biology, Professor Peter Engström tel +46-(0)18-471 2824, email Peter.Engstrom@ebc.uu.se Information about the Evolutionary Biology Centre can be found at www.ebc.uu.se The closing date for receipt of applications is 20 November, 2002. A full advertisement with information on how to apply can be obtained from Anita. Ljungstrom@uadm.uu.se and can be found at www.teknat.uu.se

The Linnaeus Centre for Bioinformatics

With a generous grant from The Knuth and Alice Wallenberg Foundation and from The Swedish Foundation for Strategic Research, Uppsala University, in cooperation with The Swedish University for Agricultural Sciences, has successfully setup The Linnaeus Centre for Bioinformatics (LCB) http://www.linnaeus.bmc.uu.se

LCB is located in the middle of Biomedicum, one of the largest biomedical research centers in Europe. The unique setting provides outstanding research opportunities. LCB is now recruiting additional collaborators at the levels of Associate (tenured) Professors, Assistant Professors, post doctoral fellows and PhD students. In particular, we invite applications for:

Associate Professor in Bioinformatics focus on Biology/Medicine (UFV-PA 2002/4294)

Associate Professor in Bioinformatics focus on Computer Science (UFV-PA 2002/4295)

Assistant Professor in Bioinformatics focus on Biology (UFV-PA 2002/4296)

For information about how to apply for the positions please contact Anita. Ljungstrom@uadm.uu.se or visit www.teknat.uu.se.

Postdoctoral fellowship (UFV-PA 2002/4309) and two PhD scholarships (UFV-PA2002/4310-4311) to work with Professor Jan Komorowski.

Dr. Komorowski's research interest is in machine learning and approximate reasoning applied to modeling of biological systems. A successful candidate for the Post Doc position will have a strong research record in bioinformatics and an interest in machine learning methods. Successful candidates for the PhD scholarships will have a strong background in computing and at least demonstrated interest in biomedicine.

For information about how to apply and research opportunities contact Dr. Komorowski, Chair. Jan. Komorowski@lcb.uu.se The closing date for receipt of applications is 28 October, 2002.

From Mouse to Cell

We are planning to recruit a post doc to join Uppsala University Transgenic Facility. The facility, located at the Biomedical Center in Uppsala, provides services for the generation of genetically modified mice. We also focus on phenotype analysis and establishment of cell cultures from transgenic and knockout mice. The person we are looking for will be involved in a project to generate ES cells and other stem cells for in vitro differentiation.

For more information: http://www.imbim.uu.se or contact Karin Nilsson, Facility Head. Phone: 46 18 471 41 58 email: karin.nilsson@imbim.uu.se



Professor in Medicine and Botany at Uppsala University

European Careers

THE STOCKHOLM-UPPSALA BIOREGION





and larger companies as a group to refine processes that would take them too much time in-house," says Caldwell of the Center for Surface Biotechnology. "We have senior technicians do the work helped by senior undergraduates doing 20-week projects. Once they get their undergraduate degrees, they're comfortable working with industrial science."

In addition to commissioning research, compa-

nies participate in instruction at local universities. "In autumn some of our scientists helped to teach a colloquium in protein purification technologies at the University of Uppsala," says Hagel of Amersham Biosciences. "In the long run," adds Amersham's human resources manager Roger Olofsson, "the dynamics the startup companies are creating give students alternatives."

Faculty members also contribute to and benefit from the activities of local biotechnology companies. Biovitrum, a firm specializing in research on metabolic diseases that is one of Europe's largest independent biotechnology companies, has strong links with Stockholm's universities. "We have a Karolinska professor specializing in diabetes who works one day a week at Biovitrum," says chief scientific officer Terje Kalland. "A professor at Stockholm University who is an expert in obesity also works with us one day a week. We have also started a fund for work on metabolic diseases at Karolinska. Biovitrum will get the first opportunity to license any intellectual property created through the funding."

VARIETY OF SKILLS

As the number of life science companies in the Stockholm-Uppsala bioregion increases, so does the variety of skills and training sought among new hires. "We recruit many Ph.D.s," says Amersham's Hagel. "We also focus more and more on people with engineering backgrounds, especially for the separation field. We want people who develop processes for pharmas." Ulf Boberg, CEO of Global Genomics, a Stockholm firm that focuses on cutting edge molecular biology and bioinformatics, has similarly broad needs. "I'm looking for molecular biologists, both senior people a few years out from their Ph.D.s and fresh Ph.D.s," he says. "I'm also looking for bioinformaticians. I would like to have people with skills in molecular biology, mathematics, and computer science. That's a tricky combination."

As they develop their research into products, companies in the bioregion increasingly seek scientists with industrial experience, gained during or after their undergraduate years. Biovitrum, for example, needs individuals who can deal with its pharmaceutical products in phases 1 and 2 of testing. "As a product-focused company, we continue to recruit chemists," says Kalland. "They are the ones who make the actual products."



For further valuable career features, go to **sciencecareers.org**, then click on **Advice**.

So far, companies have had little trouble finding those individuals. "We're in a stage where we want people with experience in industry," says Jørgensen of Affibody. "That has been quite easy given the Pharmacia situation. Their former scientists and managers have the knowledge."

However, the rapid growth of the biotechnology sector has put a premium on those individuals. "One bottleneck is providing the industry with people who have knowledge in both the technical and the chemical sides of biotechnology," says Ohman of Åmic. "We can find biology skills and technology skills, but rarely in the same person." Hartmanis of Gyros tells a similar tale. "For a long time it's been relatively easy to find scientists locally in a lot of disciplines," he says. "But it's getting increasingly hard to find people with experience, who know how to take products to market and to deal with engineering problems. The pool of experienced people is getting smaller."



FOREIGN LEGION

The obvious solution, already taken by several firms in the region, is to recruit from beyond the Stockholm-Uppsala region, and even beyond Sweden. "We have scientists of 12 nationalities, because certain competencies are not available locally," says Hartmanis. "The European Union's rules on the free movement of labor have made recruiting abroad increasingly simpler." Biovitrum

has its own tranche of foreigners, who make up about 20 percent of the 550-strong staff. "We think it's important to recruit a heterogeneous group to increase the diversity of ideas and get people with different experiences," Kalland points out. "We're recruiting mainly in Europe—the United Kingdom, Germany, and the Baltic region. We also have some scientists from the United States; we hope to recruit more in the future."

Sweden's high taxes can dissuade some scientists from emigrating. However, the government has instituted a scheme whereby overseas workers pay relatively low taxes during their first three years in the country. "That's good, particularly if you want to have scientists come in for a year or so," says Jørgensen of Affibody. "I would like to see overseas people join our team to add to the one or two foreigners we have already. We want to become an international company."

Global Genomics has found a way to recruit overseas scientists in Stockholm and Uppsala. "The Karolinska Institute has so many Ph.D. and postdoctoral trainees from China, Japan, South America, North America, and Eastern Europe that you can recruit from there," Boberg explains. "We are looking for the best people. We don't really care what nation they come from."

What does the bioregion offer scientists from around the world? "For those who want to go for an industrial rather than an academic career, a region like Stockholm-Uppsala poses a great opportunity because we have so many firms here," says Hartmanis of Gyros. "You're not taking a very large risk if the company you go to work for is not the world's best. Other companies are in the region. There's a wide opportunity to go for a career in the typical biotechnology setting."

A former science editor of Newsweek, Peter Gwynne writes about science and technology from his base on Cape Cod, Massachusetts, U.S.A.

Bioinformatics Institute

Opening New Frontiers In Biology

THE INSTITUTE

The Bioinformatics Institute (www.bii.a-star.edu.sg) is a research and training organization set up as part of a national initiative to advance biomedical research and development in Singapore. In partnership with institutions of higher education in Singapore, we will be involved in postgraduate training in both fundamental and applied areas in biomedicine.

THE POSTITIONS

We invite applications from talented and highly motivated candidates to join us in building a center of excellence for research and teaching in biomedicine. Candidates should have excellent communication skills and a collaborative attitude to working in a multidisciplinary environment.

Your research focus should be in the following areas: all aspects of bioinformatics/computational biology, genetics, medical informatics, systems biology, mathematical and theoretical biology, computer/computational science (high performance computing applied to biomedical problems, database management, data mining, massive data storage and management, security) and molecular modeling (classical and quantum).

Advantages of the appointments include opportunities for career advancement, fully funded research programs, collaborations and overseas conference travel, and excellent computing facilities. Senior level positions will come with significant resources to accomplish project goals. In addition, an extremely attractive and competitive remuneration package is offered to all appointments. We have openings at various levels (Research Programmers, Postdoctoral Research Fellows to Principal Investigators).

VISITING FELLOWSHIP PROGRAM

Senior Investigators from academia within and outside Singapore, wishing to spend a month to one year at the BII to establish research/teaching collaborations or a sabbatical are welcome to apply for our Visiting Fellowship Program. Selected individuals will receive salary and living subsidies. Preference will be given to those scientists with skills or projects complementary to the needs of the institute or to those who can participate in an ongoing BII research/training programme.

YOUNG INVESTIGATOR PROGRAM

Senior post-doctoral fellows in the fields of computational biology, genetics, medical informatics, biomedical computing, mathematics/biostatistics, and computer/computational science, interested in refocusing their careers are eligible for a three year transition Young Investigator programme. Qualified candidates will explore biomedical computing applications in a mentored, semi-independent, and team-intensive environment. Appointments will be based on domain expertise, experience, track record and project focus.

APPLICATION PROCEDURE

All applicants are required to submit the following:

- · A cover letter stating post applied for;
- A curriculum vitae;
- A one-two page statement of research accomplishment and research goals (if applicable);
- A one-two page statement of teaching interests (if applicable);
- · A list of publications:
- A list of names and contact information for three professional references (if applicable)

Applicants are encouraged to submit their applications via email to hr@bii.a-star.edu.sg
Informal enquiries can be made to Ms. Tay Wui Leng (hr@bii.a-star.edu.sg) or Dr. Gunaretnam Rajagopal (guna@bii.a-star.edu.sg). Additional information about the BII can be found at our web site: www.bii.a-star.edu.sg



Oncology Research Institute National University Medical Institutes



OPPORTUNITIES FOR SENIOR CANCER RESEARCHERS

The Oncology Research Institute, National University Medical Institutes (NUMI) at the National University of Singapore, invites applications from senior academics/researchers at the level of Associate/Full Professor to expand and develop the Oncology Research Institute into a leading international cancer research institute.

The primary task of the Oncology Research Institute is to facilitate, encourage and coordinate all cancer research in the University through dedicated teams led by top investigators. The successful candidates would be individuals with great enthusiasm, drive and commitment, and with a strong background in basic cancer research. Experience in extensive interaction with clinical oncologists would be preferred. Candidates with expertise in the areas of carcinogenesis, tumor virology, signal transduction, cancer genetics, angiogenesis and metastasis would have an advantage. Generous startup funds and facilities will be provided.

Applications should include full curriculum vitae, publication list, a summary of research accomplishments and future research plans, and the names, addresses and contact numbers of 5 professional references. Please send applications and enquiries to:

Professor Yoshiaki Ito
Director, Oncology Research Institute
National University Medical Institutes
National University of Singapore
MD11, 10 Medical Drive
Clinical Research Centre
Singapore 117597
Fax: (65) 67735461
Email: nmiitoy@nus.edu.sg

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Temasek Life Sciences Laboratory

Principal/Young Investigators

Temasek Life Sciences Laboratory (TLL) is a recently established non-profit research organisation, located within the campus of the National University of Singapore. TLL is affiliated to the National University of Singapore and Nanyang Technological University.

TLL is seeking applicants for Principal Investigator positions. All areas of research in the life sciences will be considered. Current research interests include cell biology, developmental biology, neuroscience, pathogenesis and bioinformatics; further information is available at www.tll.org.sg. TLL is particularly interested in applicants whose work will complement, strengthen and extend the current research programs. Each appointment comes with full research support for supplies, equipment and three or four fully-funded positions.

Scientists who have obtained their PhDs in the last three years are encouraged to apply for Young Investigator positions. The main criteria for selection are scientific independence and excellence. The successful candidate will be given the opportunity to conduct independent research with the assistance of research technicians and/or postgraduate students. All funding for research material and personnel will be provided by TLL.

TLL provides a supportive environment for outstanding science, with generous funding, state-of-the-art facilities, and an intellectually stimulating and collegial atmosphere.

Competitive salaries, medical, housing and other benefits are available for qualified candidates of the above two positions.

Applicants should send a curriculum vitae, three reference letters and a statement of research intent to:

Acting Director,
Temasek Life Sciences Laboratory
1 Research Link,
National University of Singapore,
Singapore 117604.

Fax: 65-68727012 Email: recruit@tll.org.sg

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We are Singapore's first fully integrated drug discovery company. Founded in June 2000, S*BIO's vision is to become an internationally competitive bio-pharmaceutical venture, to discover, develop and market products stemming from our proprietary leading-edge research.

Leveraging on Chiron Corporation's leading technologies, our research is focused on the identification and development of small molecule drug candidates. With an international team of researchers, we are a dynamic and fast-growing company located in the heart of Asia's pharmaceutical and biotechnology industry. With the country's strong support for the biomedical industry, S*BIO is committed to drug discovery in an effort to become a recognised player in the international biotech space.

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Human Resources Department S*BIO Pte Ltd, 1 Science Park Road, #05-09, The Capricorn, Singapore Science Park II, Singapore 117528. Email: recruit@sbio.com

Visit us at **WWW.Sbio.com** to find out more about the company and our position openings.

POSTDOCTORAL FELLOWSHIPS

The Genome Institute of Singapore is one of the flagship programmes in Singapore's \$\$3 billion Biomedical Sciences Initiative. Our work will integrate academic and industrial capabilities, employing a broad range of disciplines, which will include both basic and clinical/population-based approaches.

Applications are invited for postdoctoral fellow positions to study genome scale analysis of genes and molecular pathways associated with disease phenotypes.

Experience in the following areas is highly desirable: statistical genetics/biostatistics; computational biology; mouse genetics/model; human genetics; immunology, viral-host interactions; and cancer biology.

Interested applicants, please send full CVs with a recent photograph by e-mail or hard copy to:

Office of Science Management Genome Institute of Singapore

1 Science Park Road

The Capricorn, #05-01
Singapore Science Park II
Singapore 117528
E-mail: gisrecruit@nus.edu.sg
Website: www.genomeinstitute.org



Genome Institute of Singapore



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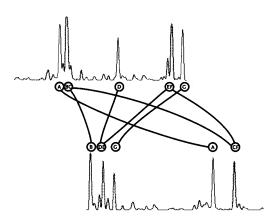
FOUNDED IN 2000, Global Genomics is a biotech company developing genomic tools for drug discovery. Tangerine - the first technology out of our pipeline, is a truly global gene expression analysis method, which provides more sensitive and comprehensive gene detection than any other high-throughput technology available today.

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Södertörns högskola is a rapidly growing young University located in Stockholm on a campus shared with the Karolinska Institute, and with convenient access to the collaborative scientific environment



of the Stockholm area. Present activities within the natural sciences are focused on the life sciences, particularly areas such as developmental biology, cell biology, structural biology and molecular genetics. We are housed in modern custom-built laboratories.

One postdoc position

(Ref: 542/42/2002) A one-year stipend on the project "Nuclear membrane organization in eukaryotic cells" at Södertörns Högskola (Section for Natural Sciences).

Applications including a CV and names of 2 referees should be sent to: Registrator, Södertörns högskola, 141 89 Huddinge, Sweden. Add state reference number; ref: 542/42/2002. Forward information by email to einar.hallberg@sh.se. Application deadline is October 31, 2002. If interested, contact professor Einar Hallberg; Phone: +46-8-608 47 33, Email: einar.hallberg@sh.se See also: www.sh.se/natur/einar.htm

www.sh.se



Karolinska Institutet Center for Genomics and Bioinformatics

The Center for Genomics and Bioinformatics (CGB) was launched in 1997 as a new academic department at the Karolinska Institute. Since then, the department has grown rapidly and now hosts over 150 researchers in the fields of genomics and bioinformatics.

At the CGB, different units exist with several research groups that are interconnected in various projects. The unit of functional genomics primarily focuses on model organisms and the development of functional genomics tools for in-vivo use. Such tools include novel antisense oligonucleotides, RNAi and viral vectors. The model organisms in focus are microbes, bacteria and T. cruzi, C. elegans, mouse and rat.

In the unit of clinical genomics, our research explores the relationship between genome variation and complex disease etiology. In particular, the focus is SNPs, bioinformatics and technology development. Alzheimer's disease, alcohol dependency, diabetes and obesity are among diseases of interest.

In the unit of bioinformatics, the goal is to elucidate functional and evolutionary patterns within the increasing mass of available genomic sequence data. This is done by integrated analyses of genomic, proteomic and chemical data. Also, we are developing improved methods in several areas of sequence analysis, molecular phylogenetics and comparative genomics.

In the unit of genomic technologies, our focus is to develop improved systems for genomics and proteomics applications. Projects include development of novel methodologies for DNA micro-array, DNA sequencing and protein localization efforts.

Highly accomplished group leaders, as well as post does and students, have been and are still recruited internationally. For positions, please contact Claes. Wahlestedt@cgb.ki.se, Professor and Chairman at the CGB or Kim.Andersson@cgb.ki.se, Information and PR Director.

Center for Genomics and Bioinformatics, Karolinska Institutet, Berzelius vag 35, 171 77 Stockholm, Sweden. Fax: +46-8-32 39 50.

For further information see our web page at www.cgb.ki.se

The National Neuroscience **Institute Singapore**

Research Positions in Neuroscience

The National Neuroscience Institute, the premier clinical neuroscience institute in Singapore, has research programmes focused on molecular mechanisms, clinical genetics, pharmacology, epidemiology, applied technology in neurological diseases. Applications are invited for the positions of principal investigator or post-doctoral research fellow. Attractive salary packages are offered according to the experience of the candidate.

Principal Investigators

Candidates should have a Ph.D. degree with experience as a principal investigator or post-doctoral fellow in neuroscience research. The individual will lead an independent neuroscience research programme and engage in cooperative research with fellow researchers.

Post-doctoral Research Fellows

Candidates should have a Ph.D. degree with a strong background in molecular genetics, molecular biology or neuroscience. The individual will work on independent research studies as part of a research programme.

Please submit a detailed curriculum vitae and particulars of three references to:

Professor Simon Shorvon (Director) or Dr WC Yee (Deputy Director of Research) National Neuroscience Institute 11 Jalan Tan Tock Seng Singapore 308433 Republic of Singapore E-mail: michelle_lian@ttsh.com.sg



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Asia-Pacific Biotech News

PROFESSORSHIPS WITHIN **WORKING ENVIRONMENT** RESEARCH

Applications are invited for 3 new professor positions at The National Institute of Occupational Health, Copenhagen, Denmark, within:

- Epidemiology and working environment surveillance
- Occupational toxicology
- Indoor climate

Detailed descriptions of the positions and information about the National Institute of Occupational Health (AMI) may be achieved by visiting our website at www.ami.dk or by contacting The National Institute of Occupational Health (Director General Ib Andersen, Director of Research Otto Melchior Poulsen, Phone (+45) 39 16 52 00).

Candidates should apply in writing to The National Institute of Occupational Health, Lersø Parkallé 105, DK-2100 Copenhagen Ø, Denmark. Please quote the reference No. of the professorship from the homepage. Closing date for applications: December 2nd 2002, at noon.



蝽 arbejdsmiljøinstituttet

AMI is an independent government research institute under the Ministry of Employment. AMI serves as a national centre of research and knowledge in occupational health. Keywords are research, development, documentation, consulting, information and teaching activities. AMI has 140 employees. www.ami.dk

ANNOUNCEMENTS

Call for Proposals BMBF Competition "Nanotechnology"

The Federal Ministry of Education and Research (BMBF) intends to give young scientists from Germany and abroad who are experienced in heading a research group the opportunity to work on new, basic research-oriented approaches in the nanosciences in Germany, independently and in their own team in order to

- generally improve career prospects in industry or science in Germany or
- encourage self-employment in the private sector (setting up businesses or spin-out companies).

The teams (staff: 1 group leader, 1-2 postdocs, 1-2 doctoral students, 1-2 technicians; investments and expendable materials: depending on the technical support required in each case) are to work for a period of 5 years on topics covering the technological use of physical, i.e., mechanical, electronic and optical phenomena characteristic of the nanometer scale (not mainstream developments aimed at merely reducing the size of today's microstructures, incl. microelectronics and those phenomena which can be achieved with individual molecules).

Non-repayable grants will be awarded to the projects selected

Deadlines: 15 June 2002 (first call) and 15 October 2002 (second call).

Further information:

Dr G. Schumacher, PTJ-FZJ, D-52425 Juelich tel +49(0)2461 61-3545; e-mail: G.Schumacher@fz-juelich.de



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Working at the University of Groningen (RUG) means working at the frontiers of knowledge. The RUG offers researchers and students the opportunity to expand those frontiers, to develop their talents and together with others realise top quality achievements. The RUG therefore deliberately opts for an interdisciplinary approach to knowledge. Discoveries are born and innovation realised at the interfaces between the various scientific fields. Researchers and students in Groningen benefit from the rich assortment of disciplines that the RUG has built up since its founding nearly four hundred years ago.

Knowledge is universal and transcends boundaries. The RUG has deliberately chosen to make a priority of intensive and worldwide cooperation with other leading universities and organisations. As well as being outward looking, the RUG is also closely involved with its own region where it is one of the largest employers. The university's 20,000 students and 5,000 staff have a distinct academic identity, firmly rooted in the wider social context. They are a vital element of the vibrant city of Groningen

RuG

The closing date for applications is Oktober 9, 2002.

Please send your written application to: The University of Groningen, Personnel & Organisation
Department, P.O. Box 72, 9700 AB Groningen, The Netherlands.
Please state the vacancy number on the envelope and at the top of your letter.

Additional information about vacancies at the RUG is available on the university web site:

www.rug.nl

The RUG has a special careers advisory service for the partners of new staff who move to the area.

The RUG is an equal opportunities employer. Because women are still underrepresented in a number of fields, they are particularly encouraged to apply.

Faculty of Mathematics and Natural Sciences

Excellent career prospects! The Faculty of Mathematics and Natural Sciences is offering young, talented researchers positions which are on the same level as those of assistant professor via the tenure-track system. Researchers are given the opportunity to develop their own line of research within a particular field. The faculty's career policy is characterised by flexible personnel management with a focus on the individual. Academic achievements are seen as being central to the academic career, and ample opportunities for professional development and supplementary training and education are offered. Arrangements for training in the area of teaching will be made with all new employees.

The policy is directed at increasing the number of women in academic staff positions. Career advancement policies for women will also be improved, and women will be actively encouraged to develop their careers.

Tenure-Track Position for Assistant Professor

VACANCY NUMBER 202196

The position Applicants are invited for a tenure-track assistant professor position in the area of molecular electronics. Successful candidates will be highly qualified in the characterization of organic opto-electronic molecules and/or polymers, and are experts in self-assembly processes of semiconducting, organic molecules and/or macromolecules (microphase separation, liquid crystallinity), self-assembled monolayers and related techniques (Langmuir-Blodgett, microscopy, FTIR, AFM, etc.).

Personal profile You will need to have the following qualifications:

- a Ph.D. degree in Chemistry and two or more years of international experience in post-doctoral capacity or experience at another educational institution or corporate research organizations
- excellent research, teaching and organisational qualities, and a good list of publications
- the ability to arrange external financing for your research.

The University of Groningen can offer you a salary dependent on qualifications and work experience from \in 2.533,- gross per month up to a maximum of \in 4.420,- gross per month (scale 12) for a full-time position.

The appointment will be on a temporary basis for a maximum of 6 years. On completion of 5 years of employment there will be an assessment of performance based on established criteria. If the outcome of the assessment is positive, the assistant professor will be promoted to the rank of associate professor with tenure. There will be another assessment at the end of a further 5-year period during which a full professorial appointment will be discussed.

For information, please contact Prof. Dr. Ir. P.W.M Blom, Physics of Organic Semiconductors, Materials Science Centre, phone +31 50 3634376, fax +31 50 3637732, e-mail < p.w.m.blom@phys.rug.nl >



Rijksuniversiteit Groningen



Assistant Professor (tenure-track) positions in biomedical engineering

at the Swiss Federal Institute of Technology Lausanne (EPFL)

The EPFL plans a substantial expansion in engineering sciences, and a major new effort in life sciences.

The Institute of Biomedical Engineering and the Hôpital orthopédique de la Suisse romande (HOSR) plan two joint Assistant Professor (tenure-track) positions in:

• Cartilage Biomechanics and Bioengineering

A strong background in prevention, diagnosis, and treatment of cartilage diseases through engineering studies of tissue structure-function relationship and the advancement of clinical technologies involved in cartilage imaging, diagnostics, evaluation and treatment is required. Special emphasis lies in making novel contributions to the emerging area of cartilage tissue engineering, particularly where biomechanical and biophysical factors may be important.

• Bone Engineering

A strong background in clinical orthopedic problems such as implant-bone interfaces, bone remodeling control or bone tissue engineering is required. A combination of engineering and biological approaches should be developed.

For both positions, the ideal candidates should demonstrate excellence in research and teaching.

The new professors will initiate independent, creative research programs and participate in undergraduate and graduate teaching. Start-up resources will be available. We offer internationally competitive salaries and benefits.



Applications, with curriculum vitae, publications list, a concise statement of research and teaching interests as well as the names and addresses (including e-mail) of at least five referees, should be sent by **November 30**, **2002** to:

Professor M. Declercq
Dean, School of Engineering
Swiss Federal Institute of Technology (EPFL)
CH-1015 Lausanne, Switzerland

More information about EPFL and its Institute of Biomedical Engineering is available at http://www.epfl.ch and http://igbm.epfl.ch

The EPFL is an equal opportunity employer.

Request for Proposals from Organizations

Host Agencies for Management Teams to Accelerate the Development and Introduction of Pneumococcus and Rotavirus Vaccines

GAVI and the Vaccine Fund have identified pneumococcal conjugate and rotavirus as two near term priority vaccines.

A framework for Accelerated Development and Introduction Plans (ADIPs) for each vaccine has been developed. These plans are modeled on a business product launch framework and will form the basis on which GAVI proceeds with plans to introduce these vaccines into the developing world. The plans prioritize efforts to establish the value of these vaccines, communicate their value to potential international and developing country decision makers and purchasers, and work with manufacturers and governments to ensure supply and delivery of these new products. Each plan would be fully funded by GAVI and The Vaccine Fund.

It is envisaged that a small, accountable, target-driven team located at the host agency will be responsible for leading the process and coordinating the work across the scientific, financial, advocacy and implementation phases for each development and introduction plan. The ADIP teams will define, coordinate and execute the plans under the supervision of the GAVI Board.

Consequently, GAVI and the Vaccine Fund are actively soliciting proposals from organizations with interest and commitment to host one or more ADIP team.

For detailed information, log on to www.vaccinealliance.org, and select ADIPs.





The Global Alliance for Vaccines and Immunization (GAVI) is a public-private partnership focused on increasing access to vaccines among children in poor countries. Partners include national governments, UNICEF, WHO, The World Bank, the Bill & Melinda Gates Foundation, the vaccine industry, public health institutions and NGOs.

The Vaccine Fund is a new financing resource created to support the GAVI immunization goals, providing financial support directly to low-income countries to strengthen their immunization services, to purchase new and under-used vaccines, and to accelerate development of new vaccines needed in the developing world.

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In the U.S. call Kathleen Clark at 202-326-6555 In Europe ring Richard Walters on +44 (0) 1223 326 500



N AAA



The Serono Foundation

for the Advancement of Medical Science

2003 Award Announcement - FELLOWSHIPS IN CANCER BIOLOGY

Fellowships will be awarded by the Serono Foundation for the Advancement of Medical Science, for postdoctoral training pertaining to the research area of cancer biology, particularly related to methodologies or therapeutic applications.

Fellowship Terms

Full-time postdoctoral training, 2 years of support, USD 45'000 annual grant towards salary and to defray personal expenses

Eligibility

- 1. Applicants must have completed a PhD and/or MD or equivalent degree, preferably not more than three years prior to the start date of the fellowship.
- 2. Candidates applying for a postdoctoral fellowship should be changing institutions.
- 3. Ability to communicate fluently in English (verbal and written).

Schedule

Application deadline

February 28, 2003

Grants announced

By July 15, 2003

Fellowships start

October 2003

For the Application form and Eligibility Guidelines, please contact:

The Serono Foundation for the Advancement of Medical Science

12, chemin des Aulx

Telephone: +41 (0)22 706 93 68

1228 Plan-Les-Ouates, Geneva

Fax: +41 (0)22 706 93 98

1220 Flati-Les-Ouales, Gene

email renee.beaudry@serono.com

Switzerland

www.serono-foundation.org

2003 WORKSHOPS

The Serono Foundation for the Advancement of Medical Science is sponsoring the following workshops in 2003:

New Therapeutic Targets in Vascular Biology

Geneva, Switzerland, 6-9 February 2003

Scientific Organizers: B. Imhof, M. Vadas, M.S. Pepper

www.symporg.ch/conference/2003/nttv/scientific_program.htm

IVth International Symposium on Molecular Steroidogenesis

Bath, UK, 24-27 April 2003

Scientific Organizers: J.I. Mason, A. Clark, J. Seckl, P.M. Stewart, G.P. Vinson

www.eurosterone.org/serono/index.html

III International Workshop in Human Implantation:

Discovery in the Reproductive Tract in Health and Disease Using Genomics/Proteomics

Madrid, Spain, 28 June 2003

Scientific Organizers: C. Simón, S. Pellicer

For further information contact Marta Gallego marta.gallego@serono.com

5th World Workshop on Inhibin, Activin and Follistatin

Siena, Italy, 3-4 July 2003

Scientific Organizers: D. de Krester, N.P. Groome, F. Petraglia, A. Schneyder, W. Vale

www.unisi.it/event/inhibin2003/

For further information and registration details, see www.serono-foundation.org



PKPD and PBPK: Modeling and Simulation Scientist

Who we are

F. Hoffmann-La Roche, a world leader in pharmaceuticals, has a reputation for successful, innovative drug development. The mission of the Preclinical Modeling and Simulation group at F. Hoffmann-La Roche Ltd. in Basel, Switzerland, is to predict the behavior of compounds in the body and provide quantitative descriptions of dose-concentration-effect relationships. As part of the Preclinical Development group, our support responsibilities range widely, from the discovery groups attempting to identify new drug candidates to the development groups working on the compounds already in our portfolio.

The position

Drawing on your depth of expertise in mechanistically based PK and advanced PK/PD (pharmacokinetic/pharmacodynamic) techniques, you will be supporting drug candidate selection and development projects in various therapeutic areas. Specifically you will be responsible for performing PB (physiologically based) PK modeling and simulation using state-of-the-art software. Your responsibilities will include the development of new methods to address modeling and simulation issues. Publication and presentation of your research findings will be strongly encouraged.

Who you are

You gained an advanced degree (PhD or equivalent) in biomedical science with an emphasis on mathematical modeling, preferably in preclinical pharmacokinetics and pharmacology, and you are an experienced user of a range of PBPK and PK/PD modeling programs. You subsequently consolidated your qualification with professional postdoctoral experience, notably in the design, interpretation and reporting of PBPK and PK/PD studies. You are fluent in English and ideally have a good command of a second language, preferably German or French.

Who to contact

Interested in this challenging position? If so, please forward your application with full supporting documentation to: F. Hoffmann-La Roche Ltd, Mr Raph Gysin, PSPB-4, 52/210, P.O. Box, CH-4070 Basel, quoting reference: Gr5881. For further information, please call Dr. Thierry Lavé on 0041-61-688 84 79 (e-mail: thierry.lave@roche.com).

Pharmaceuticals

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Calendar being published by Science Business Office.

The 2003 Scientific Events Calendar

will be published in our 13 December 2002 issue. Deadline for submissions is 8 November 2002. This calendar reaches nearly 800,000 *Science* readers who could be potential delegates, exhibitors, and sponsors for your event.

To submit a free listing go to **www.sciencemeetings.org** or call your *Science* sales representative for more information on multiple listings and advertising in this year-round resource.

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For full details contact:

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In Europe	•
phone +44 fax+44	(0) 1223 326 532
e-mail rwalters@	science-int.co.uk





Location: http://www.utwente.nl/vacatures



The chair of Systems and Materials for Information storage (SMI - University of Twente, Enschede, The Netherlands) specializes in the improvement of existing- and development of new concepts for information storage. Current research focuses on physics, materials, technologies, devices and systems for magnetic data storage.

The rapid increase of storage densities has led this field into the area of nanotechnology. Within the next decade fundamental limits in magnetic data storage will be reached, and alternative storage principles using bit-per-molecule or even bit-per-atom will have to be considered. This implies that the expertise and knowledge of the group will become increasingly multi-disciplinary, based on the disciplines of physics, chemistry, electrical engineering and computer science. This tenure position heads a research group consisting of approximately thirty members, including three Academic Staff members, two permanent technicians, visiting and postdoctoral researchers, PhD and MsC students (www.el.utwente.nl/smi).

Full Professor m/f

in Systems and Materials for Information Storage

- Education Teaching responsibilities of the chair SMI in the Bachelor program in Electrical Engineering (www.el.utwente.nl) are in areas related to physics, material science and technology. In the MSc program(s) of the faculty, the group is responsible for elective courses in the fields of information storage, materials science and microtechnology.
- · Research Research is embedded in the MESA+ research institute (www.mesaplus.utwente.nl), with its well-equiped cleanroom facilities, and includes experimental as well as theoretical activities with as major goal the improvement of existing- and development of new concepts for information storage. Current research focuses on physics, materials, technologies, devices and systems for magnetic data storage.
- Profile The successful candidate has demonstrated competence for independent research and leadership and has commitment to teaching and new teaching methodologies. He/she will establish a comprehensive, advanced research and teaching program towards information storage technology. Collaboration with colleagues in nanotechnology, microsystems and electronics technology in the well equipped MESA+ laboratory is expected. Applicants should have a PhD in Electrical Engineering or Physics.
- · Offer We are offering a full time, permanent appointment as professor in one of the largest and most quickly developing academic organizations in the Netherlands in the fields of electrical engineering and telematics. The salary for this position, depending on knowledge and experience, is at most € 7.682,- gross per month (scale professor B).
- · Information and applications For more detailed information see www.el.utwente.nl/smi or contact prof.dr.ir. A.J. Mouthaan, phone +31 53 489 11 06 (e-mail: a.j.mouthaan@el.utwente.nl). Interested candidates are invited to send a resume, publication list and a statement of their research and teaching interests by (date) to the University of Twente, attn. Dean of the Faculty of Electrical Engineering, P.O. Box 217, 7500 AE Enschede, The Netherlands, quoting vacancy number 2407/02/077.





Laboratory Director in Cell Culture Technology

Who we are

F. Hoffmann-La Roche Ltd, a world leader in pharmaceuticals, has a reputation for successful, innovative drug development. One of the missions of the Preclinical Biotechnology Group at our Basel site in Switzerland is to produce recombinant proteins using various technologies. As part of Preclinical Development, the group is responsible for supporting drug discovery groups in their efforts to find new drug candidates and for assuring optimal support for the development of portfolio compounds.

The position

Provide recombinant proteins as tools for various project groups in discovery research. Work closely with and support various labs using cell culture technology. Maintain awareness of advances in cell culture technology and expression systems and work on their further development. Support process development groups with know-how in cell culture. Collaborate closely with other cell culture teams within Roche. Publication and presentation of research findings are strongly encouraged.

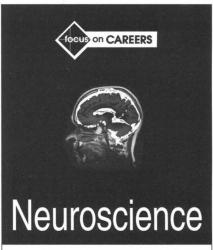
Who you are

You have a PhD in biotechnology or cell biology and extensive experience in cell culture technology and in working with various expression systems used for protein production in cell culture. Ideally, you are also familiar with the methods of scaling-up cell culture processes. You are highly motivated to work in flexible teams in a large research organisation, have excellent interpersonal and communication skills and are fluent in German and English.

Who to contact

Interested in this challenging position? If so, please forward your application, with full supporting documentation, to: F. Hoffmann-La Roche Ltd, Mr Ralph Gysin, PSPB, Building 52/210, P.O. Box, CH-4070 Basel, quoting reference: Gr5989. For further information, please call Dr B. Wipf on 0041-61-688 61 63.

Pharmaceuticals



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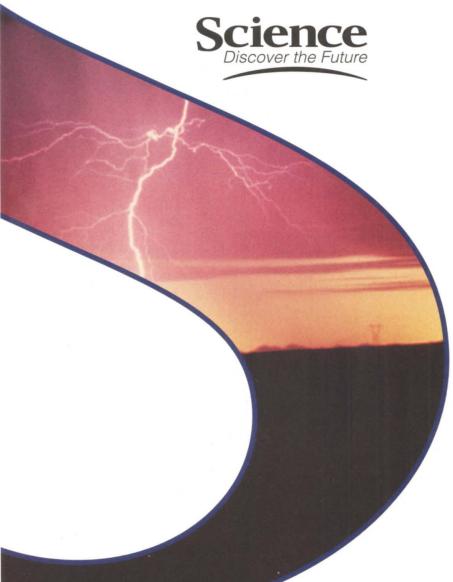
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LOVELACE RESPIRATORY RESEARCH INSTITUTE...Giving the Gift of Breath

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We will consider Postdoctoral Fellows as Research Scientists if you have a meaningful publication record. The Institute encourages Postdoctoral Fellows to write grants and stay at the Institute, developing their careers as full-time scientists.

Lovelace Respiratory Research Institute, in Albuquerque, New Mexico, is committed to the cure of respiratory diseases through research aimed at understanding their causes and biological mechanisms, eliminating exposures to causal agents, and developing improved treatments. Based on its diverse research capabilities, its close working relationships with universities and national laboratories, and its endowed and sponsored research programs, LRRI is one of the nation's largest independent, nonprofit biomedical research organizations, and the nation's only such organization wholly dedicated to basic research on respiratory health problems.

Position (E4900) with **Dr. Steve Belinsky** is available to study mechanisms underlying promoter methylation that lead to repressed chromatin, gene discovery, effect of environmental exposures, and gene targeting for inactivation. In addition, opportunities exist to participate in population-based studies that are assessing promoter hypermethylation as biomarkers for lung cancer risk, prognosis, and prevention interventions.

Position (E2399) with **Dr. Yohannes Tesfalgzi** is available to study the role of cytokines and other inflammatory mediators in regulating signaling of apoptosis in airway epithelial cells. The laboratory applies microarray and proteomic techniques, and immunocytochemical methods in rats and transgenic mouse models to study the signaling that controls homeostasis in airway epithelia. These studies have implications for treating humans with chronic bronchitis and asthma, because they address persistence of mucous cells in these subjects. Findings from animal models are tested in human *in vitro* models and population-based studies. Experience in analysis of cell signaling, transcriptional regulation, and/or genomic and proteomic techniques is desirable.

Position (E4502) with Dr. Fadi Xu is available to study the mechanisms underlying neuronal control of breathing in stressed conditions and pulmonary diseases. The laboratory is fully equipped and has a strong program funded by NIH and National American Lung Association. A multidisciplinary approach including electrophysiology, histology, immunocytochemistry and pharmacology is used. Applicants with neural physiology and respiratory physiology background preferred.

Position (E5402) with Dr. Kevin Harrod is available to study host-pathogen interactions of RSV and adenovirus in the respiratory tract, transcriptional regulation in the lung, and environmental impact of inhaled pollutants to susceptibility to respiratory viral infection. This laboratory uses multidisciplinary, state-of-the-art molecular and cellular biology techniques, including transgenic and gene-targeted models of lung disease. Funding from the NIH, ALA, Health Effects Inst., and postdoctoral training grants is available. Applicants with molecular biology, virology, and cell biology backgrounds are particularly encouraged to apply.

Position (E8199) with **Dr. Mohan Sopori** is available to study neuroimmune interactions in the control of inflammation and asthma. The lab is also studying animal models to examine the mechanisms for the increased incidence of asthma and respiratory diseases among children exposed prenatally to cigarette smoke.

Position (E5502) with **Dr. Janet Benson** is available to study the inhalation toxicity of materials of occupational, environmental, and pharmaceutical interest. The effects of the inhaled materials on the respiratory tract, immune and nervous systems, as well as mechanisms of toxicity are among endpoints of interest in the laboratory's basic and applied research. Opportunities exist to become familiar with methods of generating and characterizing exposure atmospheres, both physically and chemically. Opportunities also exist to gain experience working with industry and conducting studies under regulatory guidelines.

Position (E2400): We always welcome applications for postdoctoral fellowships in all areas of respiratory or inhalation toxicology research. If we do not have a current opening, we will keep all curriculum vitaes on file for one year. We encourage you to visit our Web site: www.LRRI.org for additional information.

Postdoctoral participants receive a competitive salary, health insurance, and a relocation allowance. Candidates should send a cover letter referencing the corresponding position number and a CV to Human Resources, 2425 Ridgecrest Drive S.E., Albuquerque, New Mexico 87108; fax to: 505/348-4976; or e-mail to: www.hrmail@lrrl.org. An Equal Opportunity/Affirmative Action Employer, M/F.

MIT

TENURE-TRACK JUNIOR FACULTY POSITION CHEMICAL ENGINEERING

The Department of Chemical Engineering at the Massachusetts Institute of Technology invites applications and/or nominations for a tenure-track junior faculty position in chemical engineering.

The ideal candidate will possess a doctorate (Ph.D., Sc.D., or equivalent) in chemical engineering or a closely related field by the beginning of the appointment period. The candidate should have demonstrated excellence in original research and a strong commitment to teaching, both at the graduate and undergraduate levels.

Interested individuals should send a current curriculum vitate, a brief description of research plans and teaching interests, and at least three letters of assessment of a professional or academic nature.

Applications must be received by January 1, 2003.

All correspondence should be directed to:
The Faculty Search Committee,
Department of Chemical Engineering,
Massachusetts Institute of Technology,
66-350, 77 Massachusetts Avenue,
Cambridge, MA 02139-4307. Minority and
women candidates are strongly encouraged
to apply.



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The Annals of the New York Academy of Sciences, published and widely cited since 1823, seeks an Executive Editor to develop publication topics and bring the multi-disciplinary and research-oriented series to new media and markets. Directing all phases of acquisition, editing, and production in print and online, the Editor will also work with senior staff in conferences, marketing, and communication to promote and integrate the annals within the Academy's range of activities.

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TWO TENURE-TRACK POSITIONS THE BOTANICAL GARDEN AND CENTRE FOR PLANT RESEARCH FACULTY OF AGRICULTURAL SCIENCE, THE UNIVERSITY OF BRITISH COLUMBIA

The Botanical Garden and Centre for Plant Research (BG-CPR) of the Faculty of Agricultural Science invites applications for two tenure-track positions. These posts will be central to the continuing development of the teaching (undergraduate and graduate) and research mission of the BG-CPR (www.ubcbotanicalgarden.org); this includes developing creative research programs involving the education of highly skilled graduate students and post-doctoral fellows.

Assistant Professor: Plant Biodiversity. The successful candidate will be expected to develop a vigorous externally funded research programme applying molecular techniques to topical issues in plant biodiversity. The post will have a formal link to the UBC Centre for Biodiversity Research (CBR) (www.zoology.ubc.ca/biodiversity) and the post holder will be expected to develop a research programme of interest to both the BG-CPR (where the post will be based) and the CBR, and to take advantage of the excellent research facilities at both Centres. Candidates with expertise in one or more of the following topics are particularly encouraged to apply: plant ecological genetics, plant molecular systematics, molecular biology of speciation, conservation biology, plant reproductive biology, biogeography.

Assistant Professor: Plant Evolutionary Genomics. The successful candidate will be expected to develop a vigorous externally funded research programme in the area of the molecular origin of plant adaptation and evolution. It is expected that the post holder will be appointed as an Associate Member of the UBC Biotechnology Laboratory (www.biotech.ubc.ca) and will be able to use research facilities of both the Biotechnology Laboratory and the BG-CPR (where the post will be based). Applications from candidates with expertise in one or more of the following areas are particularly encouraged: plant developmental biology, genomics, molecular phylogenetics, transcriptional regulation, plant transformation, plant evolutionary biology. Although molecular biology skills are highly valued for this post, the ability to work in a framework of plant evolution is more important.

For both posts, opportunities for interaction exist with the viticulture genomics initiative of the Wine Research Centre (www.agsci.ubc.ca/wine), DNA microarray core facilities and the poplar genome sequencing project of the Genome Sciences Centre (www.bcgsc.bc.ca/gc/poplar.shtml). The Botanical Garden and Centre for Plant Research (BG-CPR) has excellent living plant research collections (particularly temperate Asian woody plants), laboratory and plant growth facilities. UBC is one of Canada's premier research universities, located in Vancouver, a cosmopolitan city with a mild climate. British Columbia is an ecologically diverse province with two thirds of the Canadian flora including temperate rainforest and alpine elements. It offers excellent hiking, sailing and winter sports.



Informal enquiries about these posts are welcome directly to: Professor Quentin Cronk, Director, Botanical Garden and Centre for Plant Research (quentin.cronk@ubc.ca). Assessment of applications will begin November 1, 2002 and continue until the positions are filled. UBC hires on the basis of merit and is committed to employment equity. We encourage all qualified persons to apply; however, Canadians and permanent residents of Canada will be given priority. Applications (stating the post(s) applied for) including a cv, statement of research interests and details of three referees should be sent to: The Chair, Plant Search Committee, Faculty of Agricultural Sciences, University of British Columbia, 248-2357 Main Mall, Vancouver, BC V6T 1Z4, Canada (email: agdean@interchange.ubc.ca).



The University of Texas at Austin

Senior Faculty Positions The Institute for Cellular and Molecular Biology

The Institute for Cellular and Molecular Biology invites applications for tenured Associate Professor or Professor positions, including two Endowed Chair positions. Academic appointments will be held in an appropriate academic unit in the College of Natural Sciences. Candidates should have a well established research program involving application of molecular biological and/or biochemical approaches to important biological problems. The positions carry excellent salaries and start-up packages in a supportive, interactive and interdisciplinary research environment.

The Institute provides administrative and financial support for the University-wide Graduate Program in Cell and Molecular Biology and for the state-of-the-art core facilities for DNA and protein analysis, electron and confocal microscopy, mouse genetic engineering, DNA microarrays and robotics.

Building on a strong existing faculty, recent hires include Andy Ellington, Ellen Gottlieb, Robin Gutell, Adron Harris, Jon Huibregtse, Vishwanath Iyer, Ken Johnson, Bob Krug, Ben Liu, Paul Macdonald, Edward Marcotte, Tanya Paull, Rick Russell, John Sisson, David Stein, Scott Stevens and John Tesmer.

Austin is located in the Texas hill country and is widely recognized as one of America's most beautiful and livable cities.

Please send curriculum vitae, summary of research interests, and names of at least three references to:

Dr. Alan M. Lambowitz, Director Institute for Cellular and Molecular Biology The University of Texas at Austin 2500 Speedway Austin TX 78712-1095

Homepage • http://www.icmb.utexas.edu

The University of Texas at Austin is an Equal Opportunity Employer. Qualified women and minorities are encouraged to apply.

2003-04 Congressional Science and Engineering Fellowship Program

PROGRAM: Scientists and engineers spend one year as special assistants on the staffs of Members of Congress or congressional committees, working in legislative areas requiring scientific and technical expertise. The program includes an orientation on congressional and executive branch operations, and a year-long seminar program on issues involving science and public policy. Fellows receive stipends from their sponsoring societies.

PURPOSE: To provide a unique public policy learning experience, to demonstrate the value of science-government interaction and to make practical contributions to the more effective use of scientific and technical knowledge in government.

CRITERIA: A prospective Fellow must be a postdoctoral to midcareer scientist or engineer; demonstrate exceptional competence in some area of science or engineering; be cognizant of matters in nonscientific areas; demonstrate sensitivity toward political and social issues; and perhaps most importantly, have a strong interest and some experience in applying personal knowledge toward the solution of societal problems.

SPONSORS: Approximately 30 national professional scientific and engineering societies will sponsor or cosponsor Congressional Fellows in 2003–04.

American Association for the Advancement of Science

American Association of Colleges of Pharmacy

American Chemical Society
American Geological Institute

American Geophysical Union

American Institute of Chemical Engineers

American Institute of Physics

American Meteorological Society

American Nuclear Society

American Physical Society

American Psychological Association

American Society for Microbiology

American Society of Agronomy

American Society of Civil Engineers

American Society of Mechanical Engineers

American Veterinary Medical Association

American Welding Society

Crop Science Society of America Ecological Society of America

Federation of Animal Science Societies

Geological Society of America

Institute of Electrical and Electronics Engineers

Institute of Food Technologists

Institute of Navigation

International Society for Optical Engineering

Materials Research Society Optical Society of America

Society of Automotive Engineers

Society for Research in Child Development

Soil Science Society of America

Applicants should apply directly to the appropriate professional society. It is acceptable to apply to more than one society. Stipends, application procedures, timetables and deadlines vary by society. Underrepresented minorities and persons with disabilities are encouraged to apply. Further information about the program and the participating societies, with contact information, is available from:



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Congressional Science and Engineering Fellowship Program 1200 New York Avenue, NW • Washington, DC 20005 Phone: 202.326.6700 • E-mail: science_policy@aaas.org

www.fellowships.aaas.org

Immerge BioTherapeutics Scientist/Senior Scientist

Immediate opening for a Scientist/Sr. Scientist with expertise in vascular biology with special emphasis on endothelial cell biology. Experience in coagulation pathways and inflammation is highly desired. Expertise in molecular and immunological techniques is essential. This position requires a PhD and 2-3 years post-doctoral experience. The candidate must possess good interpersonal skills and be able to work in a small and dynamic team environment.

You'll enjoy a professionally stimulating environment and a competitive compensation package. Send your resume to:

Human Resources
Immerge BioTherapeutics
Bldg. 75
3rd Avenue
Charlestown Navy Yard
Charlestown, MA 02129

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POST-DOCTORAL FELLOWSHIPS Massachusetts General Hospital Harvard Medical School

Two positions are open for research fellows in studies of non-viral technologies to deliver proteins to the central nervous system (CNS). These positions entail the development of recombinant proteins for targeted delivery to the spinal cord. The goal is to accelerate protein therapy of brain and spinal cord disorders, with a focus on degenerative disorders such as amyotrophic lateral sclerosis.

Applicants must have a recent Ph.D. and demonstrated productivity in molecular biology and protein analysis. Salaries are competitive and negotiable depending on previous experience. Studies will be conducted in the Day Neuromuscular Research Laboratory. We have a longstanding interest in degenerative neuromuscular disorders with a focus on Lou Gehrig's disease (a lethal, paralyzing disorder). Our laboratory is part of the newly established Massachusetts General Hospital Center for Aging, Genetics, and Neurodegeneration. Research associates will be fellows both at the Massachusetts General Hospital and at Harvard Medical School. Several large universities and many biotech companies make Boston an exciting biomedical community with diverse opportunities for scientific collaborations. In addition, Boston is near excellent beaches and ski areas. Interested applicants should send curriculum vitae, names of three references and a cover letter indicating research interests and experience to: Dr. Robert H. Brown, Jr., Director, Day Neuromuscular Research Laboratory, Massachusetts General Hospital, Building 114, 16^e Street, Room 3125, Charlestown, MA 02919.

The Massachusetts General Hospital is an Equal Opportunity Employer.

FACULTY POSITIONS

The Department of Biology, Georgia Southern University, invites applications for five tenure track Assistant Professor positions and a postdoctoral visiting assistant professor position. Requirements for tenure-track positions: proficiency in English, ability to work with diverse populations. Ph.D. required at the time of application, postdoctoral experience preferred. We seek applicants who can collaborate with our faculty, secure external funding and contribute to the department's broad research emphasis on coastal biology. In addition to specific courses listed below, positions require participation in introductory courses and upper level courses in applicant's area of expertise. Starting date is 1 August 2003. Salary commensurate with qualifications.

Vector Ecology: Research should emphasize medical/veterinary entomology. The individual should be able to collaborate with members of the University's Institute of Arthropodology and Parasitology. The IAP undertakes projects on tick systematics, vector biology, arthropod-borne diseases, and zoonoses. Search Chair: **Dr. William Irbv.**

Microbiologist: Research area within microbiology is open. Teaching duties will include microbiology for health professional students. Search Chair: **Dr. Oscar Pung**.

Molecular Physiologist: Research area is open but preference may be given to individuals working with estuarine/marine systems. Teaching duties include Cellular Biology. Search Chair: **Dr. Jonathan Copeland**.

Vertebrate Biologist: Research area is open. Applicant should have some experience curating collections of lower vertebrates. Part of the assignment for this position will be the curation of the Savannah Science Museum Herpetological Collection of approximately 35,000 specimens. Search Chair: **Dr. David Rostal**.

Plant Biologist: Research area is open. Applicants should be capable of the field identification of southeastern flora. Teaching duties include plant taxonomy and possibly plant physiology. Search Chair: **Dr. John Averett**.

Post-Doctoral Visiting Assistant Professor: Research on function of Na+/H+ exchanger (NHE) function in transporting epithelia. Project focuses on molecular physiology and expression of NHE in lower vertebrates. This NSF funded work will be carried out at our home institution and during summers at The Mount Desert Island Biological Laboratory (http://www.mdibl.org/). Candidate must have background in immunological and immunohistochemical approaches and organismal physiology. Training in molecular biology techniques is desirable but not required. Graduate teaching opportunities possible. Position is currently funded for up to 3 years. Please send CV, a recent publication, and contact information for 3 references. Screening begins immediately and continues until position is filled. Search Chair: Dr. James Claiborne (http://www.bio.gasou.edu/claiborne/).

THE DEPARTMENT AND THE UNIVERSITY

The Department of Biology has a commitment to teaching and research excellence and provides an integrative biology program leading to B.A., B.S., and M.S. degrees. The Department has 29 faculty members, 600 undergraduate majors, and 40 M.S. degree students (http://www.bio.gasou.edu/). Department affiliations include the Institute for Arthropodology and Parasitology, Smithsonian Institution's National Tick Collection, Savannah Science Museum Herpetological Collection, Georgia Southern Botanical Garden and Herbarium, and Applied Coastal Research Laboratory on Skidaway Island. Georgia Southern University, is the largest center of higher education in the southern half of Georgia (http://chronicle.com/jobs/profiles/911.htm).

APPLICATION INFORMATION

Send letter of application, curriculum vitae, statements of teaching and research interests, and contact information for three references to the Search Chair (shown above), Department of Biology, Georgia Southern University, P.O. Box 8042, Statesboro, GA 30460-8042, USA. Application postmark deadline is 1 November 2002. Georgia is an open records state. Individuals who need reasonable accommodations under the ADA in order to participate in the search process should notify the search chair.

Equal Opportunity/Affirmative Action Institution.

Division Chief/Developmental-Behavioral Pediatrics

The Department of Pediatrics of the University of Pittsburgh School of Medicine and the Children's Hospital of Pittsburgh seek candidates for the position of Chief of Developmental-Behavioral Pediatrics and the Child Development Unit (CDU). The ideal candidate will provide scientific and organizational leadership to the division of 7 full- or part-time physicians, 2 faculty psychologists, staff psychologists and social workers. The CDU serves as a regional referral center for children with a range of developmental problems and as the main teaching site for medical students, residents, and other health professionals in developmental-behavioral pediatrics. Current resources of the division include a MCH-funded Leadership Education in Neurodevelopmental Disabilities training grant, Down syndrome and Autism Centers, and a variety of clinical research projects. Additional resources are available to create a Center of Excellence. The division enjoys close collaborative relationships with General Academic Pediatrics, Neonatology, Western Psychiatric Institute and Clinics, Child Neurology, Neurosurgery, Radiology, university-based allied health professionals, and community agencies. The University of Pittsburgh has several interdisciplinary centers, including the Learning Resources and Development Center, the Center for Genomic Sciences, and with Carnegie Mellon University, the Center for the Neural Basis of Cognition. Academic appointment through the University of Pittsburgh School of Medicine will be at the Associate Professor or Professor level based on the candidate's experience. Salary will be commensurate with rank and experience.

Qualified candidates should send a cover letter and CV to:

Heidi M. Feldman MD PhD
Chair, Search Committee for Child Development Unit
Ronald L and Patricia M Violi Professor of Pediatrics
and Child Development
Children's Hospital of Pittsburgh
3705 Fifth Avenue
Pittsburgh PA 15213

The University of Pittsburgh is an Equal Opportunity, Affirmative Action Employer.

FACULTY POSITIONS AT HUNTSMAN CANCER INSTITUTE



AT THE UNIVERSITY TO

Huntsman Cancer Institute and the Department of Oncological Sciences at the University of Utah invite applications for tenure-track faculty positions. We are particularly interested in candidates at the assistant professor level but qualified senior applicants will also be considered. We seek to recruit outstanding MD and/or PhD scientists who are focused on mechanistic or translational cancer research. Current research interests include gene expression, cell signaling, developmental mechanisms, cancer genetics, and cell growth control. Our disease-based programs bring together investigators interested in tackling problems related to early detection, prevention, and treatment of cancers, in particular childhood cancers (e.g. leukemia and sarcoma), colon cancer, melanoma, brain cancer, breast cancer, and ovarian cancer. We encourage applications from individuals interested in basic cellular mechanisms that are affected in tumor cells as well as those focusing on a particular type of cancer. Our research environment supports creative, multidisciplinary research within an atmosphere of strong

Interested individuals are asked to submit a CV, statement of research interests and goals, and three letters of reference. For full consideration, applications should be received before November 15, 2002. For more information on faculty and programs see www.huntsmancancer.org

Send application materials to:

institutional support.

Huntsman Cancer Institute

Attn: Recruitment Office University of Utah 2000 Circle of Hope Salt Lake City, UT 84112-5550

HCI.recruitment@hci.utah.edu

Huntsman Cancer Institute and the University of Utah are Equal Opportunity/Affirmative Action employers. Women, minority, and international candidates are encouraged to apply.



POSTDOCTORAL POSITION (REQ #3053)

The primary goal of our laboratory is to identify the treatment and hostrelated factors related to the risk of secondary tumors in children with acute lymphoblastic leukemia (ALL). Additional areas of research include identifying pharmacogenetic predictors (Nature Rev Cancer 1:99-108, 2001) of outcomes in ALL (e.g. relapse, avascular necrosis, neurotoxicity) and for pharmacokinetic dynamic endpoints. Our laboratory is part of the NIH-funded Pharmacogenetics Research Network (www.pharmacogenetics.org). Projects include developing molecular, cellular and murine models for drug-induced DNA recombination relevant for children receiving therapy for ALL (PNAS 98:10338-10343, 2001); pharmacogenetic and expression array studies incorporated into front-line clinical treatment protocols; and pharmacokinetic/ pharmacodynamic studies of thiopurines, methotrexate, asparaginase, glucocorticoids and topoisomerase inhibitors. Resources include a full range of laboratory computing and clinical facilities in a multidisciplinary and highly interactive translational research environment. The applicant should have a Ph.D., MD or PharmD degree with outstanding accomplishments in their field thus far.

Please send curriculum vitae, statement of research interests, and three letters of reference including REQ #3053 to: Dr. Mary V. Relling, Department of Pharmaceutical Sciences, St. Jude Children's Research Hospital, 332 N. Lauderdale, Room D-1052, Memphis TN 38105, or e-mail: mary.relling@stjude.org

St. Jude is an equal opportunity / affirmative action employer.

www.stjude.org



Faculty Positions Department of Biological Sciences

The Department of Biological Sciences at Dartmouth seeks applicants for two tenure track positions, open at any level. One position is in the broadly defined area of Biochemistry/Cell Biology. The second position is in the area of Cellular/Molecular Plant Biology. The successful candidates will be expected to supervise independent research programs that will attract extramural funding and provide research training for graduate and undergraduate students. The candidates will join a group of faculty whose research involves cellular, biochemical and genetic approaches to studying problems in a number of model systems. Candidates should expect to participate in teaching at the undergraduate and graduate levels. Send a current curriculum vitae, statements of research and teaching interests, a list of referees (including FAX numbers and e-mail addresses), and arrange to have at least three letters of reference sent under separate cover to:

Cell/Molecular Search Committee Department of Biological Sciences Dartmouth College Hanover, NH 03755-3576

A separate application for each position is not necessary. Although materials can be submitted by FAX (603-646-1347), note that the original documents are ultimately required. Application review will begin on October 15, 2002 and continue until the positions are filled. For further information about the department and graduate program, see http://www.dartmouth.edu/~biology/.

Women and members of minority groups are strongly encouraged to apply. Dartmouth College is an Equal Opportunity/
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The Skin Research Center of Johnson&Johnson, located at Skillman NJ, conducts basic research of skin and hair and is committed to the identification of new insights and targets for skin care. The Skin Research Center is involved in molecular and cellular studies, understanding cell-cell interactions, regulation of gene expression and proof of principle studies, contributing to target validation and to the discovery of new technologies for skin care. The Skin Research Center has library support, active research seminar series, weekly journal club meetings, research in progress reports and active interactions with senior scientists. The Skin Research Center is seeking motivated individuals with the following qualifications:

Postdoctoral Scientists, Molecular and Cellular Biology (Req. Code: 02-0003792) (Req. Code: 02-0004070) Applications are invited for two postdoctoral positions to study cellular and molecular aspects of skin biology. The successful candidates should have recently completed a Ph.D. and have solid background in biology, molecular and cellular biology, and laboratory techniques. The studies involve the processes of cell growth, cell differentiation, receptor mediated signaling, lipid synthesis, cell-cell communication and their effects on skin physiology and pathology. Demonstrated ability to write, good communication skills and ability to work in a team are important.

Postdoctoral Scientist, Protein/peptide Biochemistry and Drug Delivery (Req. Code: 02-0004069)
Applications are invited from enthusiastic research scientists to join a team of researchers working on a novel dermal delivery system. The successful candidates must possess a Ph.D. in protein chemistry or biochemistry with extensive knowledge of protein structure, function, stability, and protein/peptide transport on cellular level. Experience with biological systems and drug delivery is a plus. Demonstrated ability to write, good communication skills and ability to work in a team are important.

Find more. Visit <u>ini.com/careers</u> to explore Johnson & Johnson and to establish a profile with our Career Finder system. Please reference company, requisition code number and publication with all specific applications. Johnson & Johnson is an equal opportunity employer committed to diversity.

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POSTDOCTORAL POSITION

Opening for post-doctoral fellow/research associate with background in immunology for multidisciplinary research project in heparin-induced thrombosis involving molecular biology, antibody phage display, dendritic cells and murine models.

Qualified applicants should submit CV and names of three references to:

Douglas Cines, M.D.
Dept. Pathology and
Laboratory Medicine
513A Stellar-Chance
422 Curie Blvd
Philadelphia, PA 19104
Fax: 215-573-2012
dcines@mail.med.upenn.edu

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At Merck Research Laboratories, our priority is improving patient health around the world. It's a passion we share with a diverse workforce that is committed to the discovery of breakthrough medicines. If you have the desire to be a Merck professional, you'll find extensive resources, continued education programs, and a flexible environment that supports growth, personal empowerment and creativity. We are currently seeking outstanding scientists and biochemists with a passion for highly creative, experimental approaches to drug discovery.

Scientists Job Code: BIO000148

As a scientist at Merck Research Laboratories, you will be part of a dynamic scientific team establishing new paradigms in the search for new medicines for neurological and psychiatric diseases. Candidates must possess a minimum of 3 years' postdoctoral training or equivalent, and strong evidence of scientific productivity. (The field of training is less important than an excellent record of achievement.) Possible fields include but are not limited to: molecular biology, neuroscience, biochemistry, biology, and pharmacology.

Sr. Drug Metabolism Scientist

Candidates must possess a Ph.D. with a background in Organic Chemistry, in vitro and in vivo drug metabolism and up to 3 years' experience in a pharmaceutical setting. Knowledge of mechanistic and enzymatic aspects of metabolism, metabolite profiling of cold and radioactive samples and structural elucidation of unknown compounds using mass spectrometry, NMR and other spectral techniques are a must. Additionally, an understanding of methods of studying reactive metabolites is required.

Behavioral Pharmacologist Job Code: BEH000100

In this role, you will conduct experiments designed to explore the utility of novel drugs for the treatment of drug abuse. Candidates must be experienced in self-administration techniques and intra-cranial self-stimulation. The following experience will be considered: Ph.D. with 2-year post-doctoral training, M.S. with minimum of 3 years' post-graduate experience, or B.S. with 5 years' relevant experience.

In return for your considerable skills, we offer an excellent salary and comprehensive benefits program, including tuition reimbursement and one of the best 401(k) plans in the nation, as well as opportunities for personal growth. For consideration, please indicate the job number above and send CV to: 3535 General Atomics Court, San Diego, CA 92121; or email: mrlsd_recruitment@merck.com; or fax (858) 202-5812. We are an equal opportunity employer, M/F/D/v.



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POSITIONS OPEN

PSYCHOLOGY/BEHAVIORAL NEUROSCIENCE 2002 Job Advertisement

ASSISTANT PROFESSOR in psychology/behavioral neuroscience beginning fall 2003. The Department of Psychological and Brain Sciences at Dartmouth College plans to make a tenure-track appointment at the rank of Assistant Professor (with opportunity for a senior appointment under special circumstances). The successful candidate is expected to provide high-quality teaching at the undergraduate and graduate level and to have exhibited excellence in independent research. Applications from candidates using animals as an experimental model in any area broadly defined as behavioral neuroscience are welcome. Current areas of research include learning/ memory, spatial cognition, hormones/behavior, and sensory/motor integration. Behavioral neuroscience is one of several areas of expertise within the Department that focuses on experimental psychology. The Department is housed in a new state-of-the-art research and teaching facility that includes excellent space for animal research. Please send a letter of application stating your research interests, curriculum vitae, two to three representative journal reprints or manuscripts, and arrange for three letters of recommendation to be sent to: Jeffrey Taube, Chair, Behavioral Neuroscience Search Committee, Dartmouth College, Department of Psychological and Brain Sciences, 6207 Moore Hall, Hanover, NH 03755. Review of applications will begin November 1, 2002. With an even distribution of male and female students and over a quarter of the undergraduate student population from minority groups, Dartmouth is committed to diversity and encourages applications from women and minorities. Dartmouth College is an Equal Opportunity/Affirmative Action Employer.

THE UNIVERSITY OF TEXAS SOUTHWESTERN MEDICAL CENTER The Endowment for Scholars in Biomedical Research

UT Southwestern is pleased to announce the continuation of the Endowed Program for Scholars in Biomedical Research. The Program, which is fully funded from private endowment, will provide \$600,000 over four years to support the research activities of each new ASSISTANT PROFESSOR (tenure track) appointed to the Program; five will be appointed annually. In addition, regular funding for salary as well as research space will be provided by the medical school department or research center offering the appointment. Positions in both basic science and clinical departments are available. The goal of the program is to assure a successful beginning of the research careers of an ever-growing cadre or outstanding young Investigators at UT Southwestern.

For detailed information about currently available faculty positions, please access our website: http://www.utsouthwestern.edu/home_pages/scholars/. Southwestern, The University of Texas Southwestern Medical Center at Dallas.

UT Southwestern is an Equal Opportunity Institution.

FACULTY POSITION BOTANY

The Department of Biological Sciences, University of Northern Colorado, is seeking a faculty member in plant physiological ecology at the ASSISTANT PROFESSOR rank available August 2003. For additional information, visit our website: http://asweb. unco.edu or contact: Dr. Curt M. Peterson; Telephone: 970-351-2923; e-mail: curt.peterson@ unco.edu. The position is contingent upon funding. Applicants should submit curriculum vitae, statements of teaching philosophy and research experience/interests, selected publications, contact information for three to five references, and transcripts to: Chair, Search and Screen Committee, Department of Biological Sciences, University of Northern Colorado, 501 20th Street, Greeley, CO 80639. Review of applications will begin November 1, 2002, and continue until filled. UNC is an Affirmative Action/ Equal Opportunity Employer. Employer Relations Office, Carter Hall 2011.

POSITIONS OPEN



ASSISTANT/ASSOCIATE PROFESSOR Baylor College of Medicine

The Division of Cardiothoracic Surgery, Michael E. DeBakey Department of Surgery at Baylor College of Medicine, has a tenure-track faculty position available at the Assistant or Associate Professor level. The successful candidate will serve a bridging function between basic and clinical Scientists in a large research setting that focuses on the molecular mechanisms of cardiovascular diseases such as aortic aneurysms and cardiac abnormalities. The new faculty member will be expected to develop an independent grant portfolio and participate in collaborative research. Candidates must possess a Ph.D. or M.D. degree. Interested applicants should submit complete curriculum vitac, a brief description of research interests, and names and addresses (including e-mail and telephone numbers) of three references to:

Alan P. Stolz, M.Ed.
Baylor College of Medicine
One Baylor Plaza, FBRN B-452
Houston, TX 77030
E-mail: astolz@bcm.tmc.edu

Baylor College of Medicine is an Equal Opportunity/Affirmative Action/Equal Access Employer.

ASSISTANT PROFESSOR OF PHARMACOLOGY Human Neoplastic Disease

The Medical Sciences Program of the Indiana University School of Medicine in Bloomington invites applications from candidates with postdoctoral experience and a strong publication record for a 12-month, tenure-track position as Assistant Professor of Pharmacology starting July 2003. The successful applicant is expected to participate in teaching pharmacology to medical and graduate students and to establish an extramurally funded, independent research program, asking questions of fundamental importance to human neoplastic disease. The Program also wants to strengthen existing ties with the NCI-designated Cancer Research Institute and the Indiana Genomics Initiative. Preference will be given to those candidates who can document both teaching and cancer research expertise and whose research interests complement those of current faculty. More information may be obtained from website: http://medsci.indiana.edu. Applicants should send curriculum vitae, a statement of teaching commitment and philosophy, a summary of current and anticipated research activities, and arrange to have three letters of reference sent to: Pharmacology Search Committee, Medical Sciences Program, Indiana University School of Medicine, Jordan Hall, Bloomington, IN 47405-4201.

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

RESEARCH ASSISTANT PROFESSOR

The Department of Radiation Oncology at Univeristy of Alabama Birmingham is recruiting a nontenure-track Research Assistant Professor with a Ph.D. in virology and experience in molecular biology and construction of gene therapy vectors to carry out research in molecular chemotherapy, anti-angiogenic therapy, and apoptosis-mediated therapy in combination with chemotherapy and radiation. Candidates should submit complete curriculum vitae to: Donald J. Buchsbaum, Ph.D., Professor and Director, Division of Radiation Biology, University of Alabama at Birmingham, 1530 Third Avenue South, WTI 674, Birmingham, AL 35294-6832. An Affirmative Action/Equal Opportunity Employer.

POSITIONS OPEN

THREE TENURE-TRACK POSITIONS Genetics/Ecology/Evolution

The Department of Biology is seeking three ASSIST-ANT PROFESSORS to begin appointments in August 2003. This is a search for one Geneticist and two Evolutionary/Ecological Biologists. Applications will be accepted from qualified candidates across the full range of these disciplines, and the Department especially encourages applications from individuals who use plant and invertebrate model systems. We seek to hire three candidates who will create exciting synergies within the Department and who will participate in our active undergraduate research program. The Department is well equipped and start-up funds are available to meet the individual needs of new faculty.

Candidates are expected to (1) possess a Ph.D. degree, preferably with postdoctoral research experience; (2) teach upper-division courses in their areas of experies; (3) contribute to the introductory and/or nonmajors curriculum; (4) be involved in academic advising; and (5) develop a research program involving undergraduate participation. Applicants should send curriculum vitae, statement of teaching philosophy, summary of research interests, and names and telephone numbers of three references to: Professor Thomas Koppenheffer, Chair of Search Committee, Department of Biology, Trinity University, 715 Stadium Drive, San Antonio, TX 78212. Review of applications will begin 28 October 2002. Women and minority candidates are strongly encouraged to apply. Trinity University is an Equal Opportunity Employer.

FACULTY POSITION Department of Medicine Division of Molecular Medicine

The Department of Medicine at Harbor-UCLA Medical Center, Torrance, California, invites applications for faculty positions in the newly created Division of Molelcular Medicine. Applicants must have a Ph.D. and/or M.D. degree with a strong background in cell and molecular biology. The successful applicant will be expected to develop and maintain an independent and extramurally funded research program. Outstanding candidates with established programs are particularly encouraged to apply. Molecular Medicine faculty will interact with those in other divisions in the Department of Medicine whose collective research interest will foster strong interdisciplinary programs in basic and translational research. Applicants should submit curriculum vitae, a brief summary of current and future research plans, and names of three references to:

Terry J. Smith, M.D.
Chief, Division of Molecular Medicine
Harbor-UCLA Medical Center
1124 West Carson Street, Building C-2
Torrance, CA 90502-2006
E-mail: tjsmith@ucla.edu

Affirmative Action/Equal Opportunity Employer.

ASSISTANT PROFESSOR BIOLOGY

Assistant Professor, tenure track, to begin August 2003. We seek an individual with expertise broadly defined as interactions between physiological processes and the environment. Areas of interest may include environmental physiology, developmental plasticity, toxicology, immunology, or related fields. Teaching duties will include anatomy and physiology and/or introductory biology as well as courses in area of expertise. The successful candidate will be expected to establish an ongoing research program involving undergraduates. A Ph.D. and at least one year of postdoctoral experience are required. Submit curriculum vitae, description of research and teaching interests, and arrange for three letters of recommendation to be sent to: Dr. Thomas Clark, Chair of Search Committee, Department of Biological Sciences, Indiana University South Bend, South Bend, IN 46634. Deadline for receipt of completed applications is December 15, 2002. Indiana University South Bend is an Equal Opportunity Employer and encourages application from all qualified candidates.

ASSISTANT PROFESSOR OF HUMAN GENETICS

The Department of Human Genetics at the University of Utah School of Medicine is initiating a new, major expansion, recruiting twelve new investigators over the next six years to build upon existing strengths in Human Genetics and Developmental Biology.

We are seeking outstanding applicants at the level of Assistant Professor in the broad fields of Genetics and functional Genomics, including, but not limited to, animal models of human disease and development, genetic approaches to complex diseases, and population genetics/genetic epidemiology. Creative scientists with a record of achievement and commitment to excellence in both research and teaching are encouraged to apply. Successful candidates will receive a substantial start-up package and enjoy a stimulating and supportive research environment.

Applicants should submit curriculum vitae, a summary of research plans, relevant reprints and/or preprints, and 3 letters of reference to:

Dr. Mario R. Capecchi Co-Chairman, Department of Human Genetics Howard Hughes Medical Institute University of Utah School of Medicine 15 North 2030 East, Room 5440 Salt Lake City, UT 84112-5331



The application deadline is November 15, 2002.

The University of Utah is an Equal Opportunity/Affirmative Action Employer, encourages nominations and applications from women and minorities, and provides reasonable accommodation to the known disabilities of applicants and employees.



Department of Health and Human Services
National Institutes of Health
National Cancer Institute

GENETIC MODIFIERS OF TUMORIGENESIS Postdoctoral Positions

With nationwide responsibility for improving the health and well-being of all Americans, the Department of Health and Human Services oversees the biomedical research programs of the National Institutes of Health and those of NIH's research Institutes.

Postdoctoral positions are available in the Genetic Modifiers of Tumorigenesis Section of the Mouse Cancer Genetics Program (MCGP), Center for Cancer Research (CCR), National Cancer Institute (NCI), National Institutes of Health (NIH), Department of Health and Human Services (DHHS), in Frederick, Maryland. The section focuses on models of astrocytoma and neurofibromatosis type 1 to study the biology of tumorigenesis and the genetic basis of variable susceptibility to cancer. Interested applicants must possess a Ph.D. or equivalent and have no more than five years of postdoctoral experience. Individuals with experience in mouse modeling, gene mapping, cancer genetics, cell culture, or gene expression arrays are encouraged to apply. Interested individuals should send a two-page statement of research interests and goals, a curriculum vitae and bibliography, and three letters of reference to:

STORY SERVICES (IN)

Dr. Karlyne Reilly c/o Linda Brubaker Mouse Cancer Genetics Program NCI-Frederick PO Box B, Building 539, Room 229 Frederick, MD 21702-1201



email to brubaker@ncifcrf.gov

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Faculty Position in Molecular/Cellular Neuroscience

Washington University in St. Louis

Department of Anatomy and Neurobiology

We seek an individual taking innovative molecular or cellular approaches to fundamental questions in neural development, function, or behavior for a tenure track position as an Assistant Professor in the Department of Anatomy & Neurobiology at Washington University School of Medicine in St. Louis, MO. (see website: http://pcg.wustl.edu). The department houses 25 active research labs in neurobiology, and is part of a much larger inter-departmental neuroscience program (see website http://pcg.wustl.edu/Neuroweb). Excellent shared facilities are available for molecular and cellular neuroscience, including imaging (electron, confocal and two-photon microscopy), and mouse genetics (generation and behavioral analysis of transgenic and knockout lines). Both the department and the neuroscience program offer numerous opportunities for scientific interactions and collaborations.

Send by email to susan@pcg.wustl.edu a synopsis of research interests, a CV, and names and phone/fax/email of three references (send as ONE email attachment). Or send by regular mail to: Dr. David Van Essen, Anatomy and Neurobiology, Box 8108, Search Committee, Washington University Sch Med, 660 S Euclid, St. Louis, MO 63110, by December 1, 2002.

AA/EOE M/F/D/V.

POSITIONS OPEN

TENURE-TRACK FACULTY POSITION in molecular or cellular biophysics, Program in Biomolecular Structure and Function, Fox Chase Cancer Center. We seek outstanding applicants with a Ph.D. or equivalent for a tenure-track (ASSISTANT/ASSOCIATE PROFESSOR-level) appointment in the Basic Science Division. We are especially interested in candidates with a strong background in biochemistry and biophysics and pri-or research experience involving experimental and/ or theoretical biophysical approaches to important biological problems. Research areas of interest include but are not limited to studies of macromolecular interactions and complexes using crystallographic, spectroscopic, thermodynamic, chemical, or molecular imaging techniques; investigation of cellular processes at the single molecule level; cellular aspects of protein folding and trafficking; and molecular design or protein engineering approaches to cell-biological problems. The successful applicant will receive a generous start-up package with which to establish a vigorous, extramurally funded research

The Fox Chase Cancer Center offers a highly interactive, multidisciplinary environment supported by state-of-the-art core facilities; extramural and intramural postdoctoral training grants; endowed Fellowships; and an outstanding funding record for Investigator-initiated grant applications. To apply, please send curriculum vitae and a description of research interests to: Dr. A. M. Skalka, Senior Vice President, Fox Chase Cancer Center, 7701 Burholme Avenue, Philadelphia, PA 19111. See website: http://www.fccc.edu/research/. Fox Chase Cancer Center is an Affirmative Action/Equal Opportunity Employer.

ASSISTANT/ASSOCIATE PROFESSOR, Department of Biology, Valdosta State University. The Department of Biology announces a tenure-track faculty position at the Assistant/Associate Professor level for an individual with a strong commitment to and expertise in science education to begin fall 2003. The successful candidate will be expected to teach content-related science education courses and introductory biology courses for majors and/or nonmajors and to serve as the departmental liaison with the College of Education and state, federal, and private agencies associated with science education. The position requires a Doctorate in a biological discipline (Ph.D. or Ed.D.), the expectation of a continuing research program in the area of science education or a biological field, and a strong commitment to undergraduate teaching. Applications must include a letter stating position applied for and addressing qualifications, curriculum vitae, statements of teaching philosophy and research interests, transcripts, and three letters of reference. Review of applications will begin 15 October 2002 and will continue until the position is filled. Submit application to: Science Education Search Committee, Department of Biology, Valdosta State University, Valdosta, GA 31698-0015.

Valdosta State University is an Equal Opportunity/Educational Institution.

ANALYTICAL/BIOANALYTICAL CHEMIST

The Department of Chemistry and Biochemistry at Montclair State University invites applications for an ASSISTANT PROFESSOR position in analytical or bioanalytical chemistry to start September 1, 2003. The position is full-time, tenure track, and is subject to available funding. In addition to a Ph.D. in analytical or bioanalytical chemistry, applicants must have significant research experience and a strong commitment to teaching. Primary duties include teaching general chemistry, analytical chemistry, or bioanalytical chemistry courses and development of a strong, externally funded research program. Applications including a cover letter, curriculum vitae, brief statement of teaching philosophy and research plans, and three letters of recommendation should be sent to: Dr. Jack Isidor, Chair, Department of Chemistry and Biochemistry, Montclair State University, Upper Montclair, NJ 07043. Women and minorities are strongly encouraged to apply. Montclair State University is an Equal Employment Opportunity/Affirmative Action Employer.

POSITIONS OPEN

Wayne State University

The Department of Chemistry at Wayne State University seeks applications for tenured or tenure-track positions at the ASSISTANT to FULL PROFES-SOR levels beginning August 2003 in any area of experimental physical chemistry, computational chemistry, or inorganic chemistry. All candidates should have a Ph.D. degree in chemistry; a commitment to undergraduate and graduate education; and have the potential to develop a nationally recognized, externally funded research program. Junior candidates should send a complete résumé and description of future research plans as well as three letters of recommendation addressing both research and teaching potential. Senior candidates should send an application letter and a résumé. Information about the Department can be found at website: http://www. chem.wayne.edu. All materials should be sent to: Professor Charles H. Winter, Associate, Chair, 141 Chemistry, Wayne State University, 5101 Cass Avenue, Detroit, MI 48202-3489. Review of applications will begin in October 2002. Women and minority candidates are encouraged to apply. Wayne State University is an Equal Opportunity/Affirmative Action Employer.

PROFESSOR (GROUP LEADER) POSITIONS

Institute of Nutrition and Health The Chinese Academy of Sciences (CAS), China

The Chinese Academy of Sciences invites applications from outstanding candidates for Professor (Group Leader) positions for the newly established Institute of Nutrition and Health in Shanghai, China. This new institute will include three divisions: basic biomedical sciences, clinic nutrition and human diseases, and applied nutrition sciences and technology. Candidates with expertise in all areas of nutrition and health are encouraged to apply. The Chinese Academy of Sciences offers excellent research facilities, generous start-up and research funds, and a supportive environment to foster development of academic careers. Salary and housing benefits are very competitive and negotiable based on background and experience. Applicants must have a Ph.D. or M.D./Ph.D. degree and postdoctoral experience with significant scientific achievement. Interested candidates should send a letter of application, curriculum vitae, a statement of current and future research interests, and the names of three references to the following address: Ms. Chen Zhi-Fen, Shanghai Institutes for Biological Sciences, Chinese Academy of Sciences, 319 Yue-Yang Road, Shanghai, 200031, China. FAX: 021-64338347; e-mail: mliu@ibt.tamu.edu; chen. chen@med.monash.edu.au; and zhfchen@sibs.ac.

MOLECULAR BIOLOGIST

The Department of Pathology at University of Florida Health Science Center in Jacksonville is seeking an exceptional Investigator with expertise in human genomics and molecular biology to conduct research in human cancer and related diseases. This position will be tenure track in the University of Florida College of Medicine at the ASSISTANT PROFES-SOR/ASSOCIATE PROFESSOR level depending on qualifications. The candidate must be a Ph.D., have at least a few years of postdoctoral experience, and a well-balanced publication record. Preference will be given to those with accomplishment in breast cancer research and/or with extramural funding. Salary is negotiable; benefits are excellent. Interested candidates should send their curriculum vitae and names of three references to: Zheng Liu, M.D., Chair of the Search Committee, Department of Pathology, Shands Jacksonville, 655 West Eighth Street, Jacksonville, FL 32209. The application deadline is November 30, 2002, and the anticipated details of the street o starting date is January 1, 2003. The University of Florida is an Equal Opportunity/Affirmative Action Employer.

POSITIONS OPEN

ASSISTANT PROFESSOR Molecular and Cellular Biology Harvard University

The Department of Molecular and Cellular Biology (MCB) is seeking outstanding candidates for the position of Assistant Professor (entry-level appointment). Our department covers a broad range of topics including cellular biology, developmental biology, molecular biology, molecular evolution, molecular genetics, genomics, neurobiology, and structural biology. We are particularly interested in candidates working in the following areas: cell biological and evolutionary approaches to development, mechanistic analysis of biological action at the molecular and structural levels, and analysis of genome organization and function at the systems level

Applications should include curriculum vitae, reprints of publications, and a statement of present and future research plans (one to three pages). Complete applications and three letters of recommendation (solicited by the applicant) should be received no later than October 18, 2002. Mail applications to:

MCB Search Committee Harvard University 7 Divinity Avenue, Room 127 Cambridge, MA 02138

We strongly encourage application from women and minority candidates.

FACULTY POSITION Experimental Condensed Matter Physics

The Department of Physics and Astronomy at Dartmouth College invites applications for a tenure-track position in condensed matter physics at the ASSISTANT or ASSOCIATE PROFESSOR level. The successful candidate will be expected to establish a vigorous research program complementing research efforts in any of the areas of nanostructures, molecular materials, quantum information science, laser spectroscopy and imaging, and biophysics, balanced with a commitment to teaching at the graduate and undergraduate levels. Potential interactions with faculty in other departments including engineering, chemistry, and biology will be viewed favorably.

and biology will be viewed favorably.

Applicants should submit curriculum vitae, including a full list of publications, statements of research and teaching interests, and a list of at least four references to the following address: Faculty Search, Department of Physics and Astronomy, Dartmouth College, 6127 Wilder Laboratory, Hanover, NH 03755-3528 U.S.A.

For full consideration, applications should arrive by December 1, 2002. Dartmouth College is an Equal Opportunity/Affirmative Action Employer. We encourage applications from women and minority Scientists.

RESEARCH FACULTY POSITIONS Microbiology

The Department of Microbiology at the University of Nevada School of Medicine is seeking applications to fill three Research Faculty positions. Successful candidates will conduct laboratory investigations (supported by funds from federal and/or private agencies) into cancer immunology or the pathogenesis of emerging microbial infections. Applicants must have a Ph.D., M.D., or equivalent degree with research experience relevant to the above responsibilities. Send letter of application, curriculum vitae, and names and addresses of three professional references to: Search Committee Chair, c/o Ms. Michelle Whitaker, Department of Microbiology/320, School of Medicine, University of Nevada, Reno, NV 89557-0046. Application review will begin December 2, 2002. Equal Employment Opportunity/Affirmative Action.

HEAD, SAFETY EVALUATION

Searching for an accomplished MEDICAL DOC-TOR with clinical experience to become Head of Safety Evaluation for the Japanese subsidiary of a major global pharmaceutical organization. Fluency in English and Japanese is essential. Competitive salary and benefits. Send curriculum vitae to e-mail: cheemalp@yahoo.com. Department of Health & Human Services National Institutes of Health National Institute on Diabetes and Digestive and Kidney Diseases

Postdoctoral Fellowship
Iron in Human Health and Disease

Iron plays an important role in microbial infection and a growing number of human diseases. We study the basic biology of iron metabolism in budding yeast and human cells with an emphasis on new gene discovery (see EMBO J. 21: 3632-42). Ph.D. (awarded in past 5 years) or M.D. required, experience in molecular biology and yeast genetics preferred, but not required. Send curriculum vitae and three references to:

Caroline C. Philpott, M.D.
Liver Diseases Section, NIDDK,
NIH, DHHS
Bldg. 10, Rm. 9B16
10 Center Drive, MSC 1800
Bethesda, MD 20892-1800
carolinep@intra.niddk.nih.gov

The NIH/DHHS is an equal opportunity employer.



MIT

ENVIRONMENTAL HEALTH AND SAFETY COORDINATORS

The Massachusetts Institute of Technology's School of Science seeks three individuals to monitor compliance with environmental, health, and safety laws (i.e., EPA, and OSHA) and regulations and MIT practice. Each coordinator will be responsible for one of the following three department and lab groupings: 1) Department of Biology and Center for Cancer Research; 2) the Spectroscopy Laboratory and the departments of Chemistry and Earth, Atmospheric, and Planetary Sciences; or 3) Department Of Brain And Cognitive Science, the McGovern Institute For Brain Research, and the Picower Center For Learning And Memory.

the Picower Center For Learning And Memory.

The coordinators will oversee the day-to-day activities within their assigned department and laboratory grouping to ensure that the department and its principal investigators/supervisors are implementing their responsibilities under MIT's EHS Management System (EHS requirements). Responsibilities include supporting the department heads and laboratory directors in their responsibility for departmental EHS performance; monitoring that all activities in the department, lab or center and in each individual lab (including teaching labs), facility or space meet EHS requirements; generally recognizing and understanding the use of potentially hazardous materials (e.g., chemicals, biologicals, lasers, radioactives) and how to conduct potentially hazardous activities in accordance with EHS requirements; actively seeking approaches, methods, and new techniques to reduce or avoid the use of hazardous materials where appropriate and disseminating this information to the members of the departments; and working closely with the MIT EHS Office's lead contact and other designated EHS team members to the departments to assure that EHS requirements are satisfied.

All positions require professional certification in an environment, health and/or safety field or at least one and preferably four or more years of relevant experience in environmental, health, and/or safety compliance. They also require a bias for action; self-notivation; strong interpersonal, communication, and problem solving skills; and ability to work both independently and as part of a team. Each individual grouping also has its own requirements as follows:

Department of Biology and Center for Cancer Research - an undergraduate or graduate degree in biology or at least two and preferably four or more years of relevant experience in, or involvement with, laboratory processes. Job # 02-0870.

Departments of Chemistry and Earth, Atmospheric, And Planetary Sciences and the Spectroscopy Laboratory an undergraduate or graduate degree in chemistry or at least two and preferably four or more years of relevant experience in, or involvement with, laboratory processes. Job # 02-0868.

Department of Brain and Cognitive Science, the McGovern Institute For Brain Research, and the Picower Center For Learning And Memory - an undergraduate or graduate degree in biology or at least two and preferably four or more years of relevant experience in, or involvement with, laboratory processes. Job # 02-0869.

Interested candidates may apply online at: web.mit.edu/personnel/www/resume.htm If you do not have access to the web, a cover letter, the names of three references and resume may be submitted to: MIT Human Resources, PO Box 391229, Cambridge, MA 02139-0013. Be sure to reference appropriate job number.



MASSACHUSETTS INSTITUTE OF TECHNOLOGY

An Equal Opportunity/Affirmative Action Employer Non-Smoking Environment web.mit.edu/personnel/www

WORKSHOP

Announcement and Invitation

U.S. Climate Change Science Program: Planning Workshop for Scientists and Stakeholders

Sponsored by the participating federal agencies in the U.S. Climate Change Science Program, Incorporating USGCRP and CCRI

December 3-5, 2002

Marriott Wardman Park Hotel, 2660 Woodley Road, NW, Washington, D.C.

The United States Climate Change Science Program will hold a comprehensive Workshop on the U.S. Climate Change Science Program to receive comments on a discussion draft version of its Strategic Plan for climate change and global change studies. The Workshop will review the U.S. Global Change Research Program and Climate Change Research Initiative (USGCRP/CCRI) plans with emphasis on the development of short-term (2-5 years) products to support climate change policy and resource management decision-making. The discussion draft of the Strategic Plan will be posted on the website **www.climatescience.gov** by mid-November 2002 for scientific and public review.

Members of the scientific, stakeholder, resource management, and international climate change communities who are interested in reviewing and commenting on the plans and expected deliverables of the USGCRP/CCRI research program are encouraged to attend.

Several senior U.S.-based and international science and user group leaders have been invited to be keynote speakers for the plenary sessions.

Registration and Logistical Information is available at the website www.climatescience.gov. Pre-registration by November 15 is recommended.

www.climatescience.gov

RUTGERS

Position Announcement Developmental Neurobiology Full/Associate/Assistant Professor

The Center of Alcohol Studies of Rutgers University is currently undergoing expansion of its biomedical division and is seeking an outstanding scientist to fill a position in Developmental Neurobiology. Appointment will be made at a tenured or tenure-track level consistent with the candidate's credentials. The Center is particularly interested in recruiting an individual with experience in innovative molecular techniques. The candidate will be expected to establish an extramurally funded research program in an area of substance abuse and brain development that will interface with the current Center interests on stress, coping, alcohol drinking and drug taking. Teaching at the undergraduate and graduate level in the successful candidate's area of expertise will be expected. Candidates must have a Ph.D. or equivalent, a demonstrated publication record and, to be considered at the Full or Associate Professor level, a strong record of extramural funding.

Opportunities exist to interact with faculty from various academic departments and research centers at Rutgers and the University of Medicine and Dentistry of New Jersey as well as with the extensive pharmaceutical and biotechnology industry located in the area. The New Brunswick campus is located in a suburban area of central New Jersey, with convenient access to New York City and Philadelphia.

Review of applications will begin immediately and continue until the position is filled. Interested applicants should submit a letter of application with a statement of research and teaching interests, curriculum vitae, and the names of three references to: Dr. Dipak K. Sarkar, Search Committee Chair, Center of Alcohol Studies, Rutgers, The State University of New Jersey, 607 Allison Road, Piscataway, NJ 08854-8001. For additional information contact Dr. Dipak K. Sarkar at 732-932-1529; email: sarkar@aesop.rutger.edu.

Rutgers, The State University of New Jersey is an Equal Opportunity/ Affirmative Action Employer.

POSITIONS OPEN

PHYSICAL OCEANOGRAPHER

The Department of Marine Sciences of the University of Georgia's School of Marine Programs seeks a tenure-track ASSISTANT PROFESSOR for fall 2003 having interests in global, regional, and/or coastal physical oceanographic processes with expertise in modeling and/or observational analysis. Specific areas of interest include but are not limited to air/sea interactions, nearshore processes, buoyancy transport processes, and coupling between biological or geochemical and physical processes.

Current faculty conduct research on a wide range of biological, chemical, and physical processes in marine and freshwater environments and collaborate on large-scale studies at the land/sea interface. The successful candidate will be expected to develop an independent, funded research program and to participate in graduate and undergraduate instruction. The candidate will also be encouraged to collaborate with School of Marine Programs faculty in Athens, Georgia; at the Marine Institute on Sapelo Island; and at the Marine Extension Service facilities in Brunswick, Georgia, and on Skidaway Island, Georgia. In addition, collaborations with faculty at the Skidaway Institute of Oceanography in Savannah, Georgia, are encouraged. Applicants should send curriculum vitae, a brief statement of research and teaching interests, and names and addresses of three references to: Chair, Search Committee, Department of Marine Sciences, Marine Sciences Building, University of Georgia, Athens, GA 30602-3636. Please visit the Department's website: http://www.marsci.uga.edu. Inquiries may be addressed to: Dr. Daniela Di Iorio; e-mail: daniela@uga.edu. Applications received by January 9, 2003, are assured full consideration. The University of Georgia is an Equal Opportunity Employer.

CELL AND/OR DEVELOPMENTAL BIOLOGIST

The Department of Biology at Saint Louis University, a Catholic Jesuit Institution dedicated to education, research, and health care, is seeking applications for a tenure-track ASSISTANT PROFESSOR in cell and/or developmental biology using integrative and evolutionary approaches with eukaryotic organisms. The successful candidate will be expected to develop an independent, extramurally funded re-search program. The candidate will also provide instruction in cell biology and courses in their area of expertise. A competitive start-up package is provided. Applicants should have a Ph.D., postdoctoral experience, and a record of research productivity. Submit by postal mail curriculum vitae, statements of teaching and research goals, reprints, and three letters of recommendation to: Dr. Richard L. Mayden, CDB, Department of Biology, Saint Louis University, 3507 Laclede Avenue, St. Louis, MO 63103-2010. Information about the Department and position is at website: http://bio.slu.edu. Review of applications will begin November 1, 2002

Saint Louis University is an Affirmative Action/Equal Opportunity Employer and encourages nominations and applications of women and minorities.

FACULTY POSITION IN DEVELOPMENTAL BIOLOGY Department of Molecular Cell, and Developmental Biology

The Department of Molecular, Cell, and Developmental Biology is searching for a Developmental Biologist. Appointment will be considered at the ASSISTANT, ASSOCIATE, or FULL PROFESSOR level. Applicants with outstanding accomplishments, particularly those using genetic approaches in model organisms, are strongly encouraged to apply.

Submit curriculum vitae, summary of research plans, and names and addresses of at least three references to: MCDB Faculty Search; website: http://www.mcdb.ucla.edu/search.html. We will begin reviewing applications on November 1, 2002. Visit us at website: http://www.mcdb.ucla.edu; also see website: http://www.uclaaccess.ucla.edu. UCLA is an Equal Opportunity/Affirmative Action Employer.

POSITIONS OPEN

FACULTY POSITION Scholar in X-Ray Crystallography

The Department of Molecular Genetics, Biochemistry, and Microbiology at the University of Cincinnati, College of Medicine, has been awarded an Ohio Eminent Scholar in the area of X-ray crystallography.
The appointment will be at either the ASSOCIATE or FULL PROFESSOR level in the tenure track and we are searching for an individual investigating significant biological questions. We have already developed a very strong NMR component of our Structural Biology program, which includes several state-of-the-art spectrometers (400, 500, 600 (x2), 800 MHz). The X-ray facility will be housed in new space. The Department consists of 27 faculty members encompassing such areas as gene regulation and development, signal transduction, ion transport, immunology, pathogenic mechanisms, cancer biology, and structural biology. The Department provides an exceptional environment for an X-ray Crystallographer to actively interact with colleagues while maintaining his/her own program. The Department and college maintain a number of core facilities unparalleled in most institutions. These include a BL3 containment facility for work with pathogens, transgenic and knockout mouse cores, DNA synthesis and sequencing facilities, gene microarray analysis, proteomics, and bioinformatics. The Department maintains an active graduate program with 45 Ph.D. students.

Our program can be visited through our website: http://www.molgen.uc.edu. Applicants should submit curriculum vitae, brief description of research program, and the names of three qualified references to: Jerry B. Lingrel, Ph.D., Professor and Chair, Department of Molecular Genetics, Biochemistry, and Microbiology, University of Cincinnati College of Medicine, 231 Albert Sabin Way, Cincinnati, OH 45267-0524.

ENVIRONMENTAL STUDIES. A TENURE-TRACK POSITION will be available August 1, 2003, for an individual with interdisciplinary teaching and research interests in any area of environmental studies. The Environmental Science Department at Allegheny began as a formal program in 1971 and has grown to include two major tracks (studies and science) and a research-active faculty whose teaching and research interests span the natural sciences, social sciences, and humanities. Teaching responsibilities will include participation in a team-taught introductory course, a sophomore course in environmental problem solving, a junior-level seminar in the candidate's area of expertise, directing senior research projects, and participation in collegewide freshmansophomore seminars that emphasize writing and speaking. We seek a colleague who will embrace interdisciplinary connections within the ES Department and with other departments at the College. Send curriculum vitae; statements of teaching and research interests; and three letters of reference by November 15, 2002, to: Dr. James O. Palmer, Chair, Department of Environmental Science, Allegheny College, Meadville, PA 16335. For more information, see website: http://webpub.allegheny.edu/dept/envisci/ESInfo/. Allegheny is an Equal Opportunity Employer. Women and minorities are strongly encouraged to apply.

FACULTY POSITION ORGANIC CHEMISTRY University of California, Irvine Department of Chemistry

Applications are invited for a tenure-track position in organic chemistry at the rank of ASSISTANT PROFESSOR. Candidates must have a strong record of research accomplishments and a commitment to teaching organic chemistry at the undergraduate and graduate levels. Applicants should provide curriculum vitae, a statement of research plans, and three letters of recommendation to: Professor David L. Van Vranken, Chair, Organic Search Committee, Department of Chemistry, University of California, Irvine, CA 92697-2025. Applications must be received by October 30, 2002. The University of California is an Equal Opportunity Employer committed to excellence through diversity.

POSITIONS OPEN

CHAIR Biological Sciences University of Missouri-Rolla

The University of Missouri-Rolla invites applications for Chair of the Department of Biological Sciences to begin fall semester 2003. Candidates must have a Ph.D. and be eligible for a tenured appointment at the rank of ASSOCIATE or FULL PROFESSOR. We are seeking applicants who have evidence of accomplishments in research, teaching, and an understanding of administrative activities that support the faculty in their academic efforts. The successful candidate should have an ongoing publication record in an area of biological sciences; a record of successful competition for external grant funding; and experience in mentoring students, staff, and faculty. The Chair will be expected to participate in undergraduate and graduate education and therefore must be committed to excellence in teaching.

This search is taking place in the context of rapid growth of the Biological Sciences Department, and the successful candidate will play a major role in integrating an expanded Biology faculty into UMR initiatives aimed at interdisciplinary research with existing strengths in engineering and science departments on campus. The Department of Biological Sciences offers B.A. and B.S. degrees in general biology and the M.S. degree in applied and environmental biology and anticipates further growth to include the Ph.D. degree in the next five years. Additional information on the Department and faculty research interests is available at website: http://www.umr.edu/~biosci.

Review of applications will begin December 1, 2002, and the search will remain open until the position is filled. Applicants should submit detailed curriculum vitae; a statement of administrative experience, research goals, and teaching interests; and the names and addresses of three references to:

Human Resource Services Reference Number: R53835 University of Missouri-Rolla 1202 North Bishop 1870 Miner Circle Rolla, MO 65409-1050

UMR is an Affirmative Action/Equal Employment Opportunity Employer. Females, minorities, and persons with disabilities are encouraged to apply.

FACULTY POSITION EXPERIMENTAL BIOPHYSICS University of California, Santa Barbara Department of Physics

The Department of Physics at the University of California, Santa Barbara, invites applications for a tenure-track ASSISTANT PROFESSOR position in experimental biophysics. UCSB is known for its strong interdisciplinary collaborations in biophysics and bioengineering. The five Biophysicists already in the Physics Department collaborate with Biologists, Chemists, Mechanical Engineers, Chemical Engineers, and Materials Researchers on problems ranging from biomimetics to drug delivery and from single molecule studies to instrumentation development. The ideal candidate would be able to both benefit from and contribute to the multidisciplinary effort on the UCSB campus. Candidates for the position should have a Ph.D. or equivalent degree in physics, an outstanding record of scholarship, and should be committed to excellence in teaching. Candidates should submit a statement of current research interests and pursuits, curriculum vitae, a list of publications, and should arrange for at least three letters of recommendation to be sent to: Chair, Biophysics Search Committee, Department of Physics, University of California, Santa Barbara, CA 93106. Applications will be considered starting January 1, 2003, and will be accepted until the position is filled. We are starting the search for this position that will become available after July 2003 in hopes of identifying an exceptional candidate for whom this start date is appropriate. The University of California is an Equal Opportunity/Affirmative Action Employer committed to excellence through diversity.

North Shore-LIJ Research Institute

As one of America's largest healthcare systems, North Shore-Long Island Jewish Health System is a network of 18 hospitals, long-term care facilities, trauma centers, and home health and hospice agencies, located throughout Long Island, Queens and Staten Island. And this means more options. More opportunities. For you. For your career. The Laboratory of Experimental Rheumatology at the North Shore-LIJ

The Laboratory of Experimental Rheumatology at the North Shore-LIJ Research Institute's Center for Genomics and Human Genetics is seeking:

Post Doctoral Fellow

A highly motivated individual to join projects of gene identification and functional characterization of loci involved in the regulation of rodent models of autoimmune arthritis. M.D. and/or Ph.D.

Associate Research Scientist

A motivated individual with background in molecular immunology and/or genetics/genomics to join projects of gene identification and functional characterization of loci involved in the regulation of rodent models of autoimmune arthritis. A minimum of two years post-doctoral experience is required. Experience working with rodents is preferred. M.D. and/or Ph.D.

Please send CV and cover letter to: Human Resources Dept., North Shore-LIJ Research Institute, 350 Community Drive, Manhasset, NY 11030. E-mail: gcohen@nshs.edu



North Shore - Long Island Jewish Health System ([[[]]]



Setting New Standards in Healthcare.

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GLOBAL OPPORTUNITIES

RIKEN Brain Science Institute, Japan One Laboratory Head Applications invited for one laboratory head in the Developmental Brain Science Research Group at BSI (RIKEN)

RIKEN, the Institute for Physical and Chemical Research (http://www.riken.go.jp) launched the Brain Science Institute (RBSI) in October 1997. The RBSI has established a Developmental Brain Science Group as one of the research areas of protecting the brain. Three laboratories have been already set up; Laboratory for Developmental Neurobiology (Head, Dr. Katsuhiko Mikoshiba), Laboratory for Developmental Gene Regulation (Head, Dr. Hitoshi Okamoto), and Laboratory for Molecular Neurogenesis (Head, Dr. Tei-ichi Furuichi). These laboratories are using mouse, zebrafish, Xenopus laevis frog and other animals.

One more new laboratory will open in 2003 for investigation of the molecular and cellular mechanisms of development, differentiation and growth of the nervous system.

A new laboratory head will be required to organize a team of 5-10 researchers and technical staff and will be provided with full support for 5 years. Progress review by an international review committee occurs every 5 years with the possibility of contract renewal. There is a possibility to select as "senior scientists." (Their employment will continue at most ten years.) Applications are encouraged from outside Japan, but researchers must be willing to work at BSI full time. A strong desire for interaction with other laboratories at BSI is essential. Applicants should send a full CV listing all publications with a statement of research interests and project proposal at BSI (max 2000 words), plus names and addresses of three referees to:

Search Committee #16, Brain Science Institute, RIKEN 2-1 Hirosawa, Wako, Saitama, 351-0198 Japan FAX: +81-48-467-9744

e-mail: search16@brain.riken.go.jp

Deadline for application: October 31, 2002

RINEX TO AME

For further information about RBSI please see our web site: http://www.brain.riken.go.jp

Director, Environmental Technology Laboratory (ETL)

(A Senior Executive Service Position in the Federal Government)

Department of Commerce (DOC)
National Oceanic and Atmospheric
Administration (NOAA)
Office of Oceanic and Atmospheric
Research (OAR)
Boulder, Colorado
\$128,074 - 138,200 annually
Vacancy Announcement NOAA#02-07

As Director, ETL, the incumbent is responsible for planning, coordinating and evaluating the operation of the Laboratory; providing the scientific leadership necessary to maintain the long-term viability of the laboratory in NOAA; provides expert scientific and technical direction for the formation, evolution and management of a balanced and effective research program that is responsive to NOAA needs for improved and extended weather, climate and air quality research and services; manage all operational aspects of ETL; serves as spokesperson for ETL/OAR/NOAA among top-level scientists in NOAA, other agencies and universities in meetings leading to the identification of significant research projects and the establishment of objectives.

The incumbent is required to have the following:

- 1. Broad understanding of the scientific foundations, research challenges and observational needs in the areas of weather, climate and air quality. The incumbent should have a solid grounding in the physical sciences and the theory, application and current state of remote sensing of atmospheric and oceanic parameters by including the application of remote sensing and supporting observations necessary to improve the understanding of complex geophysical systems.
- 2.Demonstrated competence in the physical sciences sufficient to perceive complex problems in a broad perspective, to coach and infuse ideas, and to participate meaningfully in direction and evaluation of atmospheric and oceanographic research. In particular, competence in atmospheric science is required to meaningfully direct the study of regional atmospheric processes over a spectrum of time scales. The incumbent must be experienced in creating and executing focused research programs that have the potential to extend science and create opportunities for new product lines and services for NOAA.
- 3. Demonstrated ability to perform senior-level research with particular emphasis on remote sensor development and application to the environmental sciences, and to publish significant research findings in refereed literature.

Please contact **Dede Epstein at 301-713-0530, x106** for an announcement package (Internet address: dede.epstein@hrmo.noaa.gov), including mailing instructions-referring to the announcement number -OR- you may access the entire full-text vacancy from NOAA's Executive Resources Homepage (see below). Incomplete applications will be returned.

http://www.rdc.noaa.gov This vacancy will close on October 26, 2002

"NOAA Values a Diverse Workforce and is an Equal Opportunity Employer"



POSITIONS OPEN

FACULTY POSITION Microbial Physiology The Ohio State University Department of Microbiology

Applications are invited for a tenure-track faculty position at the ASSISTANT or ASSOCIATE PRO-FESSOR level in the Department of Microbiology at The Ohio State University. Applicants must have a Ph.D. in microbiology or a related discipline and postdoctoral research experience, documented evidence of high-quality research, and a strong commitment to teaching and research at a major research university. The successful applicant will be expected to develop and maintain a productive research program with extramural support and to participate in teaching at the undergraduate and graduate levels. Preference will be given to individuals with expertise in microbial physiology and a research program focused on physiology and molecular biology of an important environmental, pathogenic, or industrial prokaryote. The Department has added six new faculty members over the past three years, and an additional position is now vacant for a research-oriented scholar to join this vigorous and internationally recognized research community. The successful applicant will be provided with a very competitive salary and an excellent start-up package. To expedite the review process, applicants should send a copy of their curriculum vitae and a short description of their research interests by e-mail: microsearch@osu.edu. In addition, please submit a letter of interest, curriculum vitae, description of future research plans, and the names of at least three potential references to: Dr. Joseph A. Krzycki, Search Committee Chair, Department of Microbiology, The Ohio State University, 484 West 12th Avenue, Columbus, OH 43210-1292. For a more detailed description of the Department, please visit the website: http://www.biosci.ohio-state. edu/~microbio/. To ensure full consideration, applications should be received by November 1, 2002, but applications will be accepted until the position is filled. OSU is an Equal Opportunity/Affirmative Action Employer. Women, minorities, veterans, and individuals with disabilities are encouraged to apply.

University of California, Irvine: FACULTY POSI-TION in analytical chemistry. The Department of Chemistry and the UCI Comprehensive Cancer Center at the University of California, Irvine, invite applications for a faculty appointment at the ASSISTANT PROFESSOR rank in analytical chemistry. Applications are encouraged from candidates in all areas of analytical chemistry; however, we are seeking to hire an individual with research interests that intersect the areas of chemical sensing, nanoscience, and medical diagnostics. The ability to effectively teach chemistry at the undergraduate and graduate levels is required.

Candidates should submit their curriculum vitae, research proposals, and three letters of reference to: Professor Reg Penner, Analytical Chemistry Search Committee, Department of Chemistry, University of California, Irvine, CA 92697-2025. To ensure full consideration during the 2003-2004 academic year, applications and all supporting materials should be received by October 31, 2002. The University of California is an Equal Opportunity Employer committed to excellence through diversity.

HEAD, DEPARTMENT OF CHEMISTRY. Twelve-month tenured position in a 17-member ACS-approved department beginning July 1, 2003. Ph.D. required. Must demonstrate a commitment to excellence in undergraduate and graduate (M.S.) education. Submit a letter of application, curriculum vitae, unofficial transcripts, three letters of recommendation, and brief separate statements of ommendation, and other separate statements of administrative philosophy and departmental goals to: Department Head Search Committee, Department of Chemistry, Western Kentucky University, 1 Big Red Way, Bowling Green, KY 42101-3576. Website: http://www.wku.edu/Dept/Academic/Ogden/Chemistry.Western is a comprehensive university with an enrollment of comprehensive university with an enrollment of 17,000 students. Review of applications will begin October 25, 2002. Women and minorities are encouraged to apply. Affirmative Action/Equal Opportunity Employer.

POSITIONS OPEN

FACULTY POSITION Toxicology

The Department of Environmental Health, University of Washington in Scattle (website: http://depts.washington.edu/envhlth/), seeks applicants for tenurable, junior faculty appointment(s) (ASSISTANT or early ASSOCIATE PROFESSOR rank) for the Sheldon D. Murphy Chair in Toxicology and Environmental Health. Requirements include a Doctoral degree (M.D., Ph.D., D.V.M.) with at least two years of postdoctoral training in toxicology, pharmacology, or a closely related field. The successful applicant(s) will be expected to establish a strong, externally funded research program. Applicants with expertise in molecular toxicology (e.g., toxicogenomics, proteomics, metabonomics) are especially encouraged although candidates with other specialty areas in toxicology will also be considered. Strong preference will be given to candidates with interests in environmental and/or occupational health problems and studies in human populations. Teaching two or more courses in basic or advanced toxicology annually, collaborative interactions with other programs within the Department, and participation in one or more NIEHS-funded Centers at the University of Washington will be expected. Applications should be submitted by January 1, 2003, or until the position is filled. Interested candidates should send two copies each of curriculum vitae, statement of research and teaching interests and career goals, and names of four references to: Dr. Terrance J. Kavanagh, Chair, Toxicology Faculty Search Committee, Department of Environmental Health, University of Washington, 4225 Roosevelt Way N.E., Suite 100, Seattle, WA 98105-6099. The University of Washington is building a culturally diverse faculty and strongly encourages applications from female and minority candidates. Equal Opportunity Employer.

The Vanderbilt Institute of Chemical Biology (VICB) and the Department of Chemistry at Vanderbilt University are seeking applicants for a tenured position at the level of ASSOCIATE PROFESSOR or above or a tenure-track position at the level of ASSISTANT PROFESSOR. A goal of the VICB is to build on institutional strengths in proteomics, structural biology, and toxicology and interface with world-class centers in cancer, diabetes, and clinical pharmacology by application of the tools of chemical analysis (e.g., mass spectrometry) to relevant biological problems. Individuals who bridge the chemistry medicine interface are of particular interest. Junior candidates are expected to develop a vigorous, internationally recognized research program, whereas senior candidates will already have established such a program. Successful candidates must demonstrate a commitment to excellence in teaching in the graduate and undergraduate programs of the Department of Chemistry. Applications will be evaluated on a rolling basis and the search will continue until filled. Senior applicants should submit curriculum vitae to: Professor Lawrence J. Marnett, Chair of the Search Committee, Vanderbilt Institute of Chemical Biology, Department of Chemistry, 7332 Stevenson Center, Vanderbilt University, Nashville, TN 37235. Junior applicants should submit curriculum vitae and summaries of research and teaching plans. Vanderbilt University is an Equal Employment Opportunity/ Affirmative Action Émployer.

INSTRUCTOR

Long-term track position. Begin August 2003. M.S. required; primary teaching responsibility undergraduate anatomy/physiology (A/P) laboratories; occasional opportunity to teach lecture courses. Experience in small college preferred. Liberal arts environment. Responsibilities include academic advising, committee work; no release time or expectation for research. Strong record of teaching excellence. Letter stating interests; complete résumé; transcripts; and three letters of reference due prior to November 11, 2002, to: Sr. John Karen Frei, Dean, School of Natural and Health Sciences, Barry University, Miami Shores, FL 33161.

POSITIONS OPEN

CELL/MOLECULAR BIOLOGY

The Department of Biological Sciences at the University of Notre Dame invites applications for one TENURE-TRACK POSITION at any rank in cell and molecular biology beginning fall semester 2003. Ph.D. and/or M.D. Scientists should have postdoctoral research experience and a demonstrated record of excellence, originality, and productivity in research. Successful candidates are expected to provide new research expertise while bridging current research strengths. They will also participate in teaching one undergraduate and one specialized graduate course per year. While the research area is open to all Cell and Molecular Biologists, those utilizing genetic model systems (zebrafish, Drosophila, yeast) or employing whole genome approaches in the areas of developmental biology or neurobiology are particularly encouraged to apply.

We provide an excellent research environment including state-of-the-art optical imaging, flow cytometry and cell sorting, automated history and laser capture microdissection, and large-scale DNA sequencing and gene array facilities. The University has made a significant commitment in space and funding to develop the Center for Zebrafish Research, which provides excellent common research space for the husbandry and manipulation of zebrafish. Superb animal care and transgenic facilities also exist within the University. Additional information on the Department is available at website: http://www. science.nd.edu/biology.

The University of Notre Dame offers competitive salaries and generous start-up packages. Review of applications will begin immediately and will continue until the position is filled. Applicants should submit curriculum vitae; a brief description of research accomplishments and future research objectives; and a summary of teaching experience and teaching interests by November 25, 2002. Candidates should also have three letters of recommendation sent to: Dr. David R. Hyde, Cell and Molecular Biology Search, Department of Biological Sciences, University of Notre Dame, P.O. Box 369, Notre Dame, IN 46556-0369. For more information, contact Dr. David Hyde; e-mail: dhyde@nd.edu. The University of Notre Dame is an Affirmative Action/Equal Opportunity Employer. Women and minority candidates are encouraged to apply.

NEUROSCIENCE RESEARCH POSITION

The Division of Neurobiology at the Barrow Neurological Institute, St. Joseph's Hospital, invites applications for a staff position. The Division of Neurobiology offers a unique opportunity to focus on research in an environment designed to promote both basic and clinical neuroscience. The major responsibility of Staff Scientists is to aggressively pursue their own research interests and generate research funding to support this pursuit. Staff in the Division of Neurobiology have the opportunity to collaborate with Researchers and Residents in other BNI divisions such as Neurosurgery and Neurology. The Neurobiology Staff also hold joint appointments in various departments at the University of Arizona and Arizona State University and participate in several federally funded training programs and collaborative research projects. The Division currently has a strong research effort in the physiology of motor control and molecular neuroscience, and we are particularly interested in Scientists whose work will complement these areas. Our primary objective, though, is to maintain a highquality research program; well-qualified Researchers working in other fields of neuroscience are encouraged to apply. Depending upon the applicant, the appointment can be made at the equivalent academic rank of ASSISTANT to FULL PROFESSOR. Please send curriculum vitae, brief statement of future research interests, and names of three references to: Alan R. Gibson, Ph.D., Director, Division of Neurobiology, St. Joseph's Hospital and Medical Center, 350 West Thomas Road, Phoenix, AZ 85013. All materials should be received by January 1, 2003. St. Joseph's Hospital and Medical Center is an Equal Opportunity Employer.

Dean College of Sciences Washington State University

Washington State University (WSU), the state's land-grant university with 20,000 students, invites nominations and applications for Dean of the College of Sciences. The Dean of Sciences reports to the Provost, and in addition to the central responsibilities on the Pullman campus, the Dean is responsible for the upper-division undergraduate and graduate science programs at WSU's branch campuses in Spokane, Tri-Cities, and Vancouver, Washington.

The College of Sciences has 150 faculty, 80 staff, 1500 undergraduate and 400 graduate students. The college houses a large array of academic programs and several research centers with annual research expenditures of over 18 million dollars. For more information see the college website at www.sci.wsu.edu.

Required Qualifications: Candidates for Dean of Sciences will have a Ph.D. (or equivalent) degree, a distinguished record of accomplishment in science, and a keen awareness of future directions in science. Additionally, candidates will have demonstrated the qualities of leadership, vision and enthusiasm, and will be skilled at communicating the needs, interests and accomplishments of a professional unit to a wide range of external as well as internal constituencies.

Preferred Qualifications: Candidates will have successful experience in university-level teaching, research, administration, fiscal development, and the management of scientific endeavors. Candidates will have demonstrated a strong commitment to the advancement of science education and inter-disciplinary scientific inquiry within the context of a major research university, and equally strong commitments to the principles of academic freedom, faculty governance, and opportunities for advancement among faculty, students, and staff.

The Search Committee will begin reviewing candidates on October 31, 2002. Nominations and applications will be accepted until the position is filled. All nominations or letters of application with vita, and names, addresses, phone and email of at least three references should be sent to: **Dean Anjan Bose**, **Chair**, **Dean of Sciences Search Committee**, College of Engineering and Architecture, **Dana Hall Room 146**, WSU, Pullman, WA 99164-2714; (509) 335-5593.

All inquiries, nominations, and applications will be held in strictest confidence. WSU is an Equal Opportunity/Affirmative Action Educator and Employer. Members of ethnic minorities, women, Vietnam-era or disabled veterans, persons of disability and/or persons between the ages of 40-70 are encouraged to apply.

DIRECTOR AND 7 FACULTY POSITIONS Center for Bioinformatics and Computational Biology University of Maryland, College Park

The University of Maryland invites faculty applications at the assistant, associate, and full professor level for the newly established Center for Bioinformatics and Computational Biology. The campus has committed resources to recruit up to eight new faculty in the Center, including a Director. It is anticipated that the primary specialization areas of the faculty will collectively span fields of computer science, mathematics and statistics, biology, and biochemistry. Their primary responsibility will be to lead a nationally visible research program in selected areas of computational genomics, proteomics, molecular evolution and phylogenetics, complementing existing strengths at the University of Maryland. Candidates for the Director position are expected to be senior researchers with prominent recognition in these areas. All other applicants are expected to have publications and research experience beyond the Ph.D. degree with strong components of biological science and computing. Experience in interdisciplinary collaboration is an asset. The faculty will be housed in contiguous space set aside for the Center and will have access to significant high-end computing infrastructure through the University of Maryland Institute for Advanced Computer Studies. Each faculty member will also be affiliated with at least one other campus academic unit appropriate to her/his interests. There is ample potential for collaboration with other outstanding bioinformatics research groups nearby, in organizations such as NIH, Celera, TIGR, the Maryland Biotechnology Institute, and the Smithsonian Institution.

To apply, send a letter of application, curriculum vitae, letters of recommendation, and URL for additional information to the search committee, in care of the appropriate departmental representative. See http://www.umiacs.umd.edu/centers/bio.htm for more information about the Center and the application procedure. Applications completed by November 30, 2002 will receive full consideration.

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

GLOBAL OPPORTUNITIES

RIKEN Brain Science Institute, Japan Senior Staff Scientists

The Brain Science Institute (BSI), RIKEN, Japan, established October 1997, is seeking two young, highly motivated researchers with post-doctoral experience for newly created senior staff positions. Research at BSI is organized under four headings: "Understanding," "Protecting," and "Creating the Brain," as well as "Advanced Technology Development." Currently, 37 teams and 8 senior staff scientists are engaged in cutting edge research in an international and collaborative research environment (http://www.brain.riken.go.jp).

The two new positions will be in the Neuronal Function Research Group of the "Understanding the Brain" division. The Group is focused on sensory systems and their plasticity, including vision (Lab Head: T.K. Hensch, Nature 404:183), olfaction (Lab Head: Y. Yoshihara, Neuron 22:33), and audition (Lab Head: N. Hessler, Nature Neurosci. 2:209). Applications are invited from those who can lead a small independent team (3-4 members) and actively contribute an innovative research project that complements the interests of the Group. Successful candidates will take up their posts as soon as possible after April, 2003.

Contracts are renewed yearly and may be continued up to ten years pending successful external review of the Group at five-year intervals. Candidates must reside in Japan for the duration of the research. Send applications to the address below and include:

- 1. Full curriculum vitae + reprints of three publications
- 2. Names and contact details of three referees
- 3. A research proposal of about 2000 words

Application deadline: October 31, 2002



Brain Science Institute, RIKEN 2-1 Hirosawa, Wako-shi Saitama 351-0198, Japan Fax: +81-48-467-2306 e-mail: search15@brain.riken.go jp

Agricultural Research Service

DIRECTOR WESTERN HUMAN NUTRITION RESEARCH CENTER

The U.S. Department of Agriculture, Agricultural Research Service, Western Human Nutrition Research Center, Davis, CA, invites applications for the position of Director, a Senior Executive Service vacancy, (\$126,549-\$138,200, includes locality pay). The Western Human Nutrition Research Center's research programs are directed toward development and evaluation of diet-based nutritional intervention strategies to improve health and provide reliable, reproducible research results for use in developing national nutritional policies.

The Center is located on the campus of the University of California at Davis and has a close working relationship with university administration and faculty. As Director, the incumbent works with ARS management and the National Program Staff in planning, coordinating and evaluating a number of human nutrition research projects that are carried out by the research scientists within the Center. In addition, the Center Director provides leadership and assures excellence of the research program, provides operational accountability with a view toward Federal-State partnerships and goals of the ARS National Program in Human Nutrition, and plans research with other Federal agencies, Land-Grant organizations, and other outside institutions.

Applicants must meet mandatory qualifications, as specified in the vacancy announcement, and address specific executive core and technical qualifications. A doctoral degree in biological sciences, medicine or allied disciplines pertinent to the work of the position to be filled is desired. This is a competitive, permanent appointment, and US. Citizenship is required. Applications must be marked "ARS-SES:02-04." For specific application procedures and requirements, please call Stacy Aldrich (301) 504-1448; OR you may obtain a copy of the vacancy announcement via the Internet at http://www.afm.ars.usda.gov/divisions/hrd/vacancy/02-04.htm. Applications must be postmarked by November 4, 2002.

ARS is an Equal Opportunity Provider and Employer. Women and minorities are encouraged to apply.

Illinois Institute of Technology has a TENURE-TRACK FACULTY POSITION available in the Biology Division of the Department of Biological, Chemical, and Physical Sciences. Scientists conducting excellent and innovative research in any area of biology are encouraged to apply. However, the Department acts in a highly interdisciplinary manner, with strong interactions among biology, chemistry, and physics; candidates who can bridge one or more areas are also encouraged to apply. The rank of the position is open. Applications from exceptionally qualified senior Scientists are welcomed. The successful candidate will be provided with a competitive start-up package and laboratory space and will be expected both to establish an extramurally funded research program and to assume teaching duties in our undergraduate and graduate programs. The search will remain open until filled; however, for full consideration, send curriculum vitae; a summary of research plans; a statement of teaching competencies, interests, and philosophies; and names of three references by November 1, 2002, to: Professor Benjamin Stark, Department of Biological, Chemical, and Physical Sciences, Illinois Institute of Technology, 3101 South Dearborn, Chicago, IL 60616. E-mail: benjamin.stark@iit.edu. Electronic transmission of documents is preferred. IIT is an Affirmative Action/ Equal Opportunity Employer and especially encourages applications from qualified women and minority candidates.

ASSISTANT PROFESSOR of biology. The Department of Biological Sciences at Chapman University seeks a broadly trained Plant Ecologist for a tenure-track position beginning fall 2003. Chapman is an independent, comprehensive university located 30 miles south of Los Angeles in a culturally diverse community. Applicants must have a Ph.D., postdoctoral experience, publications record, and the potential to attract funding. The successful candidate will be expected to teach a range of courses, including science general education, while sustaining an active research program. Send curriculum vitae, statement of teaching and research goals, and four letters of recommendation to: Dr. Janeen Hill, Chair, Department of Biological Sciences, One University Drive, Chapman University, Orange, CA 92866. Review of applications begins November 1, 2002. Chapman University and the Department of Biological Sciences are committed to diversity in the workplace and encourage applications from minorities, persons with disabilities, and women.

Gustavus Adolphus College invites applications for a tenure-track position of ASSISTANT PROFES-SOR in the Department of Biology to begin September 1, 2003. Responsibilities will include teaching the animal portion of introductory organismal biology course; upper-level invertebrate course, January term; and two courses based on expertise. We seek candidates who study physiological or developmental questions involving invertebrates. Preference given to those who can connect interests to others in department. Ph.D. required; postdoctoral and teaching experience desired. Send letter of application, curriculum vitae, statements of teaching philosophy and research interests, transcripts (photocopies acceptable), and three letters from professional references to: Dr. William Heidcamp, Chair, Department of Biology, Gustavus Adolphus College, 800 West College Avenue, St. Peter, MN 56082-1498. Review of applications will begin on October 21, 2002, and continue until the position is filled. Gustavus Adolphus College is a coeducational, private, Lutheran (ELCA), residential, national liberal arts college of 2,500 students. Equal Opportunity Employer.

Volt Scientific Services would like to highlight the following professional opportunity: A world-class research and development organization with multiple late-stage products in the pipeline is looking for a DOCTOR OF VETERINARY MEDICINE. If you have five to eight years of experience working in a pharmaceutical, contract laboratory, or academic facility, send your curriculum vitae for consideration to e-mail: aarmendariz@volt.com; Telephone: 800-253-9605, Extension 1316.

POSITIONS OPEN

DEVELOPMENTAL BIOLOGIST FACULTY POSITION Stanford University

The Department of Biological Sciences at Stanford University seeks applicants for a tenure-track faculty appointment in the area of developmental biology at the rank of ASSISTANT PROFESSOR. We are particularly interested in candidates studying developmental phenomena at the level of detailed molecular and biochemical mechanisms. Areas of interest include but are not limited to understanding how eukaryotic promoters and enhancers function to specify cell-type specific patterns of gene expression; molecular mechanisms regulating cell polarity, asymmetric cell division, or developmental cell motility; and signaling pathways controlling development of complex tissues. We are also interested in the application of genomewide approaches to defining such mechanisms. The successful applicant is expected to conduct a vigorous research program and to contribute to our teaching programs for both undergraduate and graduate students. For information about the Department, consult website: http://www.stanford.

edu/dept/biology/.

Applicants should send a letter of application (include e-mail address and FAX number), curriculum vitae including bibliography, research statement, and description of teaching experience to:

Chair, Developmental Biologist Faculty Position Department of Biological Sciences 371 Serra Mall Stanford University Stanford, CA 94305-5020

Candidates should also arrange for three letters of recommendation to be forwarded directly to this address and include in their application the names and e-mail addresses of individuals writing those letters. All materials should be received by November 1, 2002. Stanford University is an Equal Opportunity/Affirmative Action Employer; women and minority candidates are encouraged to apply.

GROUP LEADER POSITIONS Shanghai Institutes for Biological Sciences (SIBS)

Chinese Academy of Sciences (CAS)

Shanghai Institutes for Biological Sciences (SIBS) was established in 1999 as a result of the merge of eight of China's top biological research institutions of CAS in the Shanghai area. At present, SIBS hosts over 150 Principal Investigators at both junior and senior levels including 27 members of two of China's most prestigious national academies and more than 800 on-training Ph.D. students.

Now SIBS kindly invites applications for Group Leader positions in the areas of neuroscience, proteomics, stem cell research, immunology, developmental biology, pharmaceutical science, plant sciences, and biotechnology. Depending on the applicant's qualifications, SIBS will provide a package including start-up funds, a competitive salary, and housing benefit. Applicants must have a Ph.D. degree or equivalent and postdoctoral experience with significant scientific achievement. Interested candidates should provide curriculum vitae, a summary of research experience and accomplishments, a research proposal (two to four pages), and three recommendation letters to: Mr. Weijun Wang, Shanghai Institutes for Biological Sciences, 319 Yue Yang Road, Shanghai 200031, China. Telephone: +86-21-64317485; FAX: +86-21-64338347; e-mail: wjwang@sibs.ac.cn.

RESEARCH FELLOW POSITION available early 2003 in City University of Hong Kong. US\$44,800 per year for two years. The candidate should have obtained Ph.D. within past three years; have had at least two papers published in scientific journals since 2000; and be expert in at least one of following areas: enzymology, molecular biology, and organic synthesis and/or computer modeling of protein structure. Send curriculum vitae to: Dr. Ding Li, BCH Department, City University of Hong Kong, Kin, Hong Kong. E-mail: bhdingli@cityu.edu.hk.

POSITIONS OPEN

JUNIOR FACULTY POSITION Section of Immunobiology Yale University

The Section of Immunobiology seeks applicants for a Junior Faculty position. Qualified applicants in all areas of immunobiology are invited to apply. We are particularly interested in candidates who will complement the existing faculty. Research interests represented within the Section of Immunobiology include innate immunity; lymphocyte activation, differentiation, and tolerance; T and B lymphocyte development; antigen processing and presentation; signal transduction; transcriptional regulation; cytokines; immunoglobulin gene rearrangement; and autoimmunity. Candidates are expected to develop an independent research program and to participate in departmental teaching. A candidate's application package must include curricu-lum vitae, a summary of present and future research interests, and three letters of recommendation. Completed applications should be received at the address below no later than January 1, 2003.

> Kim Bottomly, Ph.D. Chair, Search Committee Section of Immunobiology Yale University School of Medicine P.O. Box 208011 New Haven, CT 06520-8011

An Equal Opportunity/Affirmative Action Employer. Women and minority candidates are encouraged to apply. The Section of Immunobiology is committed to increasing representation of members of minority groups and women on the faculty and particularly encourages applications from such candidates.

CONSERVATION BIOLOGIST

A tenure-track faculty position in conservation biology is available at the ASSISTANT PROFESSOR level in the Biology Department at Wesleyan University. We are especially interested in candidates whose research addresses conservation biology issues in a fundamental research context by drawing on one or more of the following disciplines: evolutionary genetics, population ecology, behavioral ecology, ecophysiology, or systematics. We expect field work on natural populations to be a significant component of the successful candidate's research program. Wesleyan's Biology Department has a research-oriented faculty that successfully attracts outside funding. Candidates should have a Ph.D. and at least two years of postdoctoral experience. The successful applicant will be expected to set up an independent research program and to participate in the departmental Ph.D. program. Teaching (at undergraduate and graduate levels) will be in the areas of conservation biology, field biology, ecology, and/or evolution depending on the candidate's expertise. Please send us your curriculum vitae; a concise statement of future research plans; and have three letters of recommendation sent to: Conservation Biology Search Committee, Department of Biology, Wesleyan University, Middletown, CT 06459-0170 by October 31, 2002. Wesleyan University values diversity and is an Equal Opportunity Employer.

ASSISTANT PROFESSOR, ECOLOGY. The Department of Biology, University of Tampa, invites applications for a tenure-track position beginning in August 2003 to teach introductory biology, ecology, and environmental science. The Department is interested in attracting a broadly trained Aquatic or Terrestrial Ecologist to complement the existing faculty in biology (website: http://www.ut.edu). The candidate is expected to engage in research activities that involve undergraduates. Ph.D. required; prior teaching and research experience with undergraduates desirable. Send curriculum vitae; statement of teaching philosophy and research interests; official transcripts; and the names, addresses, and telephone numbers of three references who are willing to provide letters of recommendation. Review of applications will begin December 1, 2002, and continue until the position is filled. All materials should be addressed to: The University of Tampa, Human Resources, c/o Ecology Search, 401 West Kennedy Boulevard, Tampa, FL 33606-1490. Equal Opportunity Employer/Affirmative



Mera Pharmaceuticals, the world leader in natural products from microalgae using its patented photobioreactor technology for scalable fermentations, is establishing a new R&D site in San Diego for natural products drug discovery. We have exceptional opportunities for experienced researchers/managers. You are a leader in your field with sustained performance, accomplishments and a strong publication record. You must have experience in managing people and projects, building highly effective teams, and working collaboratively. Excellent verbal and written communication skills are essential.

HEAD OF ASSAY BIOLOGY

As a member of the senior team, you will lead development of in-house assays – initially for antibiotic and cancer targets – in pursuit of Mera's drug discovery goals, as well as manage external collaborations. This position requires a Ph.D. in biochemistry, microbiology or related field and 5+ years' relevant experience in the pharmaceutical/biotechnology industry. Experience and technical expertise in modern assay technologies, in particular for antimicrobial targets, and database management are important.

HEAD OF MICROBIOLOGY

As a member of the senior team, you will lead microbiology and molecular biology in pursuit of Mera's drug discovery goals, including managing external collaborations. Although the initial program focuses on cyanobacteria, future expansion to exploit other microalgae is anticipated. This position requires a Ph.D. in microbiology or microbial molecular biology and 5+ years' relevant experience in the pharmaceutical/biotechnology industry. Experience and technical expertise in fermentation technology, microbial physiology, and database management are important. Industry experience in antibiotic drug discovery research would be an advantage.

Please send resumes to: Mera Pharmaceuticals, attn L. Johnson, 777 South Highway 101, Suite 215, Solana Beach, CA 92075; Fax: (858) 847-9090.

DEAN, COLLEGE OF SCIENCES AND TECHNOLOGY SAVANNAH STATE UNIVERSITY

Visionary leader for Natural Sciences and Mathematics, Engineering Technology, Naval Science and Military Science departments offering ten Undergraduate and one Masters program.

Reports to Vice President for Academic Affairs. Committed to work with faculty/staff to achieve university's goals; ability to inspire/encourage diverse faculty/staff excellence. Plans/implements degree and non-degree programs, manages budget, strategic planning, curriculum development, promotion of research, faculty development, personnel decisions, student academic affairs, and collaborative programs implementation. Seeks funding, and implementation of the purposes of the college.

SSU, a Historically Black University is a unit of University System of Georgia which comprises 34 universities/colleges. The University nicknamed College by the Sea is located adjacent to marshes and tributaries, with direct access to the Atlantic Ocean. Beaches of Tybee and Skidaway islands, historic downtown Savannah, the famous squares, historic buildings, and internationally famous River Street are minutes from the beautiful palm-treed campus. Savannah is located near Hilton Head, South Carolina, Jacksonville, Florida and Atlanta, Georgia.

Requires terminal degree in a discipline with a proven record in teaching, research and service that warrants appointment as tenured Professor in one or more of the departments. Relevant administrative experience, minimum of department chair or equivalent. Demonstrated commitment to excellence in teaching and research. Ability to work with constituencies on/off campus. Effective interpersonal and communication skills.

We are accredited by the Commission on Colleges of the Southern Association of Colleges and Schools (1866 Southern Lane, Decatur, Georgia 30033-4097 (404) 679-4501), to award associate, baccalaureate and masters degrees.

Submit letter describing stated qualifications, current curriculum vitae, and names, addresses, and telephone numbers of three current references to: Dr. Olarongbe Olubajo, Chair Search Committee, Dean of COST, Human Resources, P.O. Box 20601, Savannah, GA 31404, Tel: (912) 356-2275; Fax: (912) 691-6839, Email: olubajoo@savstate.edu. Open until filled.

EOE

Faculty Position University of California, San Diego The Division of Biological Sciences Section of Molecular Biology

The Molecular Biology Section of the Division of Biology at the University of California, San Diego is seeking qualified (Ph.D. or M.D.) applicants for the position of Assistant or Associate Professor. The area of research interest may relate to immunology, immunopathology, virology, or cancer biology. The successful applicant should have postdoctoral and academic experience commensurate with the level of the appointment, and in particular have demonstrated the potential to be a leader in his or her chosen field. The position includes laboratory space in the new Natural Sciences Building scheduled for completion in early 2003 and would be adjacent to investigators with interests in immunology, virology, molecular biology, and cancer biology. The Natural Sciences Building includes a high quality, barrier mouse facility sufficient to accommodate the needs of the resident investigators. Resources will be made available to provide for laboratory start-up and operation until extramural funding has been obtained. In addition to carrying out outstanding research, the successful candidate will be expected to participate in undergraduate and graduate education in his or her area of expertise. The level of appointment will be commensurate with qualifications and experience, with salary based on University of California pay scale.

Complete applications received by November 15, 2002 will be assured of consideration. Applicants should send a curriculum vita, bibliography, a description of research plans, and three letters of reference (forwarded separately) to:

Molecular Biology/Immunology Search Committee c/o Sandra Brierley – Mail Code 0346A University of California, San Diego 9500 Gilman Drive La Jolla, CA 92093-0346

UCSD is an Equal Opportunity-Affirmative Action Employer with a strong institutional commitment to the achievement of diversity among its faculty and staff.

GLOBAL OPPORTUNITIES

RIKEN Brain Science Institute, Japan Two Laboratory Heads Applications invited for two laboratory heads in the Recovery Mechanisms Research Group at BSI (RIKEN)

The Institute of Physical and Chemical Research (RIKEN) established the Brain Science Institute (BSI) in October 1997 to promote three strategic research areas: 'Understanding', 'Protecting' and 'Creating' the brain. The Recovery Mechanisms Research Group is a cornerstone of 'Protecting the Brain', which pursues the recovery mechanism of the nervous system. At present, Cell Recovery Mechanism Laboratory (Head, **Dr. Masayuki Miura**) is already set up. Recovery Mechanisms Research Group focuses on the research on the mechanism of proliferation and differentiation of neural stem cells, and the mechanism of the death of neural cells, which are both important for neural repair process. New laboratories will open in 2003. A qualified candidate should have a strong background in cellular, molecular and genetic neuroscience.

New laboratory heads will be required to organize a team of 5-10 researchers and technical staff and will be provided with full support for 5 years. Progress review by an international review committee occurs every 5 years with the possibility of contract renewal. There is a possibility to select as "senior scientists." (Their employment will continue at most ten years.) Applications are encouraged from outside Japan, but researchers must be willing to work at BSI full time. A strong desire for interaction with other laboratories at BSI is essential. Applicants should send a full CV listing all publications with a statement of research interests and project proposal at BSI (max 2000 words), plus names and addresses of three referees to:

Search Committee # 18, Brain Science Institute, RIKEN 2-1 Hirosawa, Wako, Saitama, 351-0198 Japan FAX: +81-48-467-9744

e-mail: search18@brain.riken.go.jp Deadline for application: October 31, 2002



ASSISTANT PROFESSOR Microbial Genomics or Proteomics

The Department of Biological Sciences at Louisiana State University and A&M College, Baton Rouge, invites applications for an anticipated tenure-track position in genomics or proteomics at the Assistant Professor level available August 2003. We seek an individual who will expand this department's capability in genome-enabled microbial science. Areas of interest include but are not limited to the application of func-tional genomics or proteomics tools to individual microbes or microbial communities, comparative genomics, and the creation and utilization of bioinformatics tools for analyzing sequence data. Applicants are encouraged to visit our website: http:// www.biology.lsu.edu. The successful candidate is expected to have a Ph.D. or equivalent degree in a biological science or related field and postdoctoral experience. He or she will be expected to develop a strong, competitively funded research program and teach at the graduate and undergraduate levels. Review of applications will begin November 15, 2002, and will continue until a suitable candidate is identified. The application, consisting of curriculum vitae; a two-to-three-page statement of research and teaching interests; three letters of recommendation; and no more than three representative publications, should be sent to: Microbial Genomics/Proteomics Search, c/o Dr. John R. Battista, Department of Biological Sciences, Louisiana State University, Baton Rouge, LA 70803 U.S.A. Reference Log Number 0323. E-mail: jbattis@lsu.edu. LSU is an Equal Opportunity/Equal Access Employer.

ASSISTANT/ASSSOCIATE PROFESSOR Infectious Disease of Wildlife Division of Biological Sciences and Fish and Wildlife Biology Program The University of Montana

The Division of Biological Sciences at The University of Montana invites applications for a tenure-track Assistant/Associate Professor studying wildlife diseases with primary responsibility in the interdisciplinary Fish and Wildlife Biology Program. The successful applicant will hold a Ph.D. or Ph.D./D.V.M. and will be expected to develop an interactive, extramurally funded research program in the ecology or pathogenesis of infectious disease in wildlife populations and to participate in both undergraduate and graduate education in wildlife biology. Individuals with research interests that complement those of existing faculty are strongly encouraged to apply. For information on the position and application procedures, see websites: http://biology.dbs.umt.edu/and http://www.forestry.umt.edu/academics/wildlife. For full consideration, applications should be received by October 21, 2002. The University of Montana, an Equal Opportunity/Affirmative Action Employer, seeks to employ outstanding men and women who contribute to the cultural diversity valued in a university setting.

THE CLEVELAND CLINIC FOUNDATION Signal Transduction

ASSISTANT/ASSOCIATE PROFESSOR-level position to complement existing research programs in cardiac, vascular, and neuronal function. Expertise in cell and molecular biology techniques to investigate excitation-response signaling is required. Join a growing research program in the Division of Anesthesiology and Critical Care Medicine utilizing in vivo, in vitro, and molecular techniques to address fundamental research issues. Numerous collaborative opportunities with clinical departments and the Lerner Research Institute. Competitive salary and start-up funds. Visit website: http://ccfanes.estco.net/anesthesia/ Research for more information. Candidates should send curriculum vitae, names and FAX numbers of three references, and a brief statement of research interests to: Dr. Paul A. Murray, Carl E. Wasmuth Endowed Chair and Director, Center for Anesthesiology Research, FF40, The Cleveland Clinic Foundation, 9500 Euclid Avenue, Cleveland, OH 44195. The Cleveland Clinic Foundation is an Affirmative Action/Equal Opportunity Employer.

POSITIONS OPEN

ASSISTANT/ASSOCIATE PROFESSORS Chemical Biology and Pharmaceutics Medical University of South Carolina (MUSC)

The Department of Pharmaceutical Sciences at MUSC invites applications for tenure-track faculty positions in chemical biology/medicinal chemistry and pharmaceutics. Chemistry applicants with research programs in the development of novel drugs to treat cancer, central nervous system disorders, or diseases involving proteases (or which utilize combina-torial approaches to drug discovery) are particularly encouraged to apply. Pharmaceutics applicants should have research programs in drug delivery, biopharmaceutics, or pharmacokinetics. The Depart-ment of Pharmaceutical Sciences is under new leadership and is undergoing dramatic growth with the addition of five new faculty members over the next three years. Excellent opportunities exist for collaborations in the MUSC Hollings Cancer Center, Neuroscience Institute, and Gazes Cardiac Research Institute. MUSC, located in the beautiful oceanside historic district of Charleston, South Carolina, receives over \$130 million per year in research funding. Excellent salaries and benefits, competitive start-up packages, and renovated laboratory space will be offered. The successful applicants will have a Ph.D. and postdoctoral experience and will be expected to develop an independent research program while participating in graduate and professional teaching. Review of applications will begin November 1, 2002, and will continue until the positions are filled. Applicants should submit curriculum vitae, statement of research interests, and contact information for four references to: Dr. Rick G. Schnellmann, Department of Pharmaceutical Sciences, Medical University of South Carolina, 280 Calhoun Street, P.O.B. 250140, Charleston, SC 29425. Telephone: 843-792-3117; e-mail: schnell@musc.edu. MUSC is an Equal Opportunity Employer.

WILDLIFE/FISHERIES SPATIAL ECOLOGY University of Wyoming

The Department of Zoology and Physiology at the University of Wyoming invites applications for a tenure-track position in wildlife/fisheries biology with a spatial/landscape ecology focus at the level of ASSIST-ANT PROFESSOR beginning August 2003. Ph.D. required for faculty rank. Teaching responsibilities include an introductory course in fisheries and wildlife management along with upper-division courses in the candidate's area of expertise. Research should involve spatial aspects of wildlife/fisheries habitat issues and utilize such approaches as GIS, remote sensing, or spatial statistics/modeling. The candidate will be expected to develop an extramurally funded research program, mentor undergraduates in our wildlife and fisheries biology major, and advise graduate students. The candidate will be encouraged to interact with natural resource agencies and with the University of Wyoming's School of Environment and Natural Resources.

Review of applications will begin on November 15, 2002. Applicants should send curriculum vitae, statements of research and teaching interests, and arrange to have three letters of reference sent to: Chair, Wildlife/Fisheries Spatial Ecology Search Committee, Department of Zoology and Physiology, University of Wyoming, Laramie, WY 82071-3166. Website: http://uwadmnweb.uwyo.edu/Zoology. The University of Wyoming is an Affirmative Action/Equal Opportunity Employer.

POSTDOCTORAL POSITIONS Prostate Cancer Biology

Positions available to participate in an NIH-funded program studying regulation of genes related with progression of prostate cancer. Expertise in molecular biology and the ability to work with rodents as well as cell cultures essential. Some experience in cell biology and/or signal transduction is highly desirable. Please send curriculum vitae and contact information for three references to: Girish Shah, Ph.D., Professor of Pharmaceutical Sciences, Texas Tech University Health Sciences Center, 1300 Coulter, Amarillo, TX 79106. E-mail: girish@ama.ttuhsc.edu.

POSITIONS OPEN

TENURE-TRACK FACULTY POSITIONS MEMBRANE BIOLOGY Vanderbilt University School of Medicine

The Vanderbilt University School of Medicine, Department of Anesthesiology, invites applications for tenure-track/tenured faculty positions at the ASSIST-ANT, ASSOCIATE, and FULL PROFESSOR levels from individuals working in the areas of ion channel and transporter physiology and molecular biology. Candidates must have a Ph.D. and/or M.D. degree and a record of excellence and innovation in research.

We seek outstanding Scientists who will develop independent, extramurally funded research programs that will contribute to the Department's and Vanderbilt University's rapidly growing strength in membrane biology. Current research interests in the Department include functional genomics of ion channel/transporter physiology in model organisms (Curr. Biol. 11:161–170, 2001); structure/function of Na+ and K+ channels (Nature 409:1043–1047, 2001); function/regulation of CNS cation-chloride cotransporters (Nat. Genet. 22:192–195, 1999); and molecular mechanisms of neurosecretion (J. Physiol. 539:419–431, 2002). Vanderbilt University offers an outstanding interactive research environment with state-of-the-art core facilities. Salary and start-up packages are highly competitive and commensurate with experience.

Applicants should send curriculum vitae, representative reprints, the names of three references, and a statement of research interests and future research plans to:

> Faculty Search Committee Anesthesiology Research Division 1161 21st Avenue South T-4202 Medical Center North Nashville, TN 37232-2520

NEEL DISTINGUISHED CHAIR IN BIOTECHNOLOGY Department of Biological and Physical Sciences Kennesaw State University

The Department of Biological and Physical Sciences at Kennesaw State University is accepting applications for the Holmes Neel Distinguished Chair in Biotechnology available August 2003. The successful candidate will be expected to provide leadership for a recently approved baccalaureate program in biotechnology and to develop collaborations with local biotechnology industry partners. Minimum qualifica-tions are a Ph.D. in biology or a related field, a demonstrated ability to develop a multidisciplinary research program in an area related to biotechnology, and a record of sustained extramural funding. Review of applications will commence on November 1, 2002, and will continue until the position is filled. Submit a letter describing qualifications for the position; a statement of research interests; a plan for interacting with the local biotechnology community; current curriculum vitae; graduate transcripts; and the names, addresses, telephone numbers, and e-mail addresses of three references to: Dr. Kathleen Fleiszar (e-mail: kfleisza@kennesaw.edu), Neel Distinguished Chair Search Committee, Department of Biological and Physical Sciences, Number 1202, Kennesaw State University, 1000 Chastain Road, Kennesaw, GA 30144-5591.

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

MARINE INVERTEBRATE ECOLOGIST.

The Department of Biology at Sonoma State University invites applications for a tenure-track position in invertebrate marine ecology beginning fall 2003. Areas of specialty include physiological, population, community, or evolutionary ecology of near-shore organisms. See full announcement at website: http://www.sonoma.edu/biology. For additional information, contact: Dr. J. Hall Cushman; e-mail: cushman@sonoma.edu; Telephone: 707-664-2142. Review of applications begins October 25, 2002.

MOLECULAR BIOLOGY UNIVERSITY OF SOUTHERN CALIFORNIA

The Program in Molecular and Computational Biology at USC invites applications for multiple tenured and tenure-track positions. We are seeking beginning and established investigators in any area of genetics or molecular, structural, cell, and developmental biology. Successful applicants will have outstanding opportunities for participating in inter-disciplinary programs in neuroscience, computational biology, genomics, and evolution. Additional information is available at http://www.usc.edu/dept/LAS/biosci/. Please send CV and statement of research plans and have three letters of recommendation sent to: MCB Search Committee, Dept of Biological Sciences, University of Southern California, Los Angeles, CA 90089-1340 (email: eyokas@usc.edu).

MOLECULAR NEUROBIOLOGY UNIVERSITY OF SOUTHERN CALIFORNIA

The Neurobiology Section of the Department of Biological Sciences at USC invites applications for a tenure-track position at any level in the area of molecular neurobiology. We are interested in candidates who use molecular approaches to study neuronal development, synaptic function, sensory systems or signal transduction. Successful applicants will also receive an appointment in our multidisciplinary Neuroscience Program, which has broad strengths in the neural, informational, and behavioral sciences. Review of applications will commence December 1, 2002. Send curriculum vitae and statement of research plans and have three letters of recommendation sent to: Search Committee, Molecular Neurobiology, University of Southern California, Los Angeles, CA 90089-2520 (email: hatcher@usc.edu). Additional information is available at http://www.usc.edu/dept/LAS/biosci/.

USC is an Affirmative Action/Equal Opportunity Employer.



University of Florida Biomedical Engineering Department Faculty Positions

The College of Engineering at the University of Florida invites applications and nominations for Faculty candidates at all levels starting Fall 2003. We are establishing a department where innovation, risk-taking, creativity, interdisciplinary research and collegiality are nurtured and encouraged. Candidates are expected to have a strong commitment to excellence in graduate education, scholarship and research in a fundamentally interdisciplinary environment. The areas of interest include, but are not limited to, imaging, signal processing, cell and tissue engineering, neuroengineering, biomems, cardiac engineering, and rehabilitative engineering. Successful candidates will be expected to develop world-class interdisciplinary research programs. Candidates are expected to possess academic credentials sufficient to meet requirements for full, associate and assistant professorships in Biomedical Engineering. Salary will be competitive and commensurate with qualifications of the candidate.

The newly established Biomedical Engineering Department has a strong institutional commitment from the University of Florida to lead the formation and development of both graduate and undergraduate programs. The collaborations and strong ties to other world class centers such as the Evelyn F. & William L. McKnight Brain Institute, The NSF National High Magnetic Laboratory, the NSF Engineering Research Center for Particle Science and Technology and the newly established Genetics Institute provide unequaled opportunities to develop a world class department. The BME Department facilities are conveniently located adjacent to both the Medical Center and the College of Engineering on a single campus.

The search committee will begin reviewing applications on October 4, 2002 and continue to receive applications until the positions are filled. Candidates should send curriculum vitae with the names of at least four references to: Dr. Frank Bova, Chair of Search Committee, Biomedical Engineering Department, University of Florida, PO Box 116131, Gainesville, FL 32611-6131; Email: search@bme.ufl.edu; Telephone: (352) 392-9790. For more information about the department and the positions, please visit: www.bme.ufl.edu.

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

FACULTY POSITION IN BIOINFORMATICS Assistant Professor Department of Pharmacology University of North Carolina at Chapel Hill

The Department of Pharmacology at the University of North Carolina at Chapel Hill invites applications for a tenure-track faculty position at the Assistant Professor level. Applicants should have a Ph.D., M.D., or M.D./ Ph.D. We seek an individual who will establish a dynamic, contemporary research program in the general area of Bioinformatics. Strongest consideration will be given to candidates with expertise in genome/proteome/ transcriptome data-mining, algorithm and database design/integration, structural prediction and/or machine learning/machine inference. As part of an ongoing University-wide initiative in Genome Sciences, the successful candidate will join a vibrant, collegial department and contribute to the development of a new departmental initiative in chemical biology. Incoming faculty will be expected to establish a bioinformatics research program supported by extramural funding, participate in our graduate training program and teaching of medical and dental students. Excellent start-up package, access to departmental, institutional, and state-wide computer services and other core facilities will be provided. Candidates should submit a curriculum vitae, statement of current and future research plans, selected recent publications and names of four references to:

> Chair, Faculty Search Committee for Bioinformatics, Department of Pharmacology, CB#7365 University of North Carolina at Chapel Hill, 1106 Mary Ellen Jones Bldg., Chapel Hill, North Carolina 27599-7365

Applications completed by December 15, 2002 are guaranteed full consideration.

The University of North Carolina at Chapel Hill is an Equal Opportunity/ADA Employer.

ASSISTANT/ASSOCIATE PROFESSOR OF BIOCHEMISTRY

The Department of Biochemistry University of Missouri-Columbia invites applications for two tenure-track Assistant or Associate Professor positions, particularly from scientists using molecular approaches to characterize macromolecules and their interactions. In a multi-year expansion, the department (www.biochem.missouri.edu) will complement existing strengths in receptors, signaling, proteins and enzymes, gene expression, radiopharmaceuticals, structural biology and plant biochemistry. The University is noted for interdisciplinary research programs, which will be enhanced by a \$60 million Life Sciences Center under construction. Position qualifications include a Ph.D. in biochemistry or a related field or an M.D., and postdoctoral experience. Successful applicants will have or develop an outstanding research program and contribute to Departmental teaching activities. Potential involvement in campus-wide programs in proteomics, cancer, cardiovascular disease, neurobiology and aging, and plant biology is desirable.

Submit a curriculum vitae and descriptions of current and planned research activities, and have three letters of reference sent to:

Chair Biochemistry Search Committee
Department of Biochemistry
117 Schweitzer Hall
University of Missouri-Columbia
Columbia, MO 65211

Electronic submission to **biochemsearch@missouri.edu** is encouraged. Review of applications will begin November 15. To request ADA accommodations contact (573) 884-7278 (V/TTY).

MU is an EEO/AA Employer and encourages applications from women and minorities.

ASSISTANT PROFESSOR Physical Biochemistry

The Department of Biological Sciences at the Louisiana State University invites applications for a tenure-track Assistant Professor position in physical biochemistry. The position is open to all areas of interest including but not limited to thermodynamics, kinetics, structural biology (crystallography and NMR), and cellular biophysics. LSU has a Beowulf cluster (currently ranked the seventh most powerful supercomputer in the world) and its own synchrotron with beamlines for crystallography and small-angle scattering (website: http://camd.lsu.edu). The Department has recently expanded into a new 70,000square-foot Life Science annex and offers competitive start-up packages. A Ph.D. or equivalent degree and postdoctoral experience are required. The successful candidate will be expected to maintain an extramurally funded research program and contribute to undergraduate and graduate teaching. Review of applications will begin November 15, 2002, and continue until the position is filled. Send curriculum vitae, a statement of research and teaching interests, relevant reprints, and three letters of recommendation to: Physical Biochemistry Search, c/o Dr. Marcia Newcomer, Department of Biological Sciences, Louisiana State University, Baton Rouge, LA 70803. Reference Log Number 0322. Additional information about the Department is available at website: http://www.biology.lsu.edu.

LSU is an Equal Opportunity/Equal Access Employer.

ASSISTANT PROFESSOR BIOLOGICAL CHEMISTRY School of Medicine Johns Hopkins University

The Department of Biological Chemistry at the Johns Hopkins University School of Medicine invites applications for a tenure-track position at the Assistant Professor level. The Department is seeking candidates with an outstanding record and a commit-ment to excellence in research and teaching (website: http://biolchem.bs.jhmi.edu). Applicants should submit (preferably as a single PDF file) curriculum vitae, list of publications, summary of research plans, and representative reprints to e-mail: bcsearch@bs. jhmi.edu. In addition, three letters of recommendation should be sent to:

> Dr. Denise Montell Search Committee Chairperson Department of Biological Chemistry The Johns Hopkins University School of Medicine 725 North Wolfe Street Baltimore, MD 21205

Applications should be received by October 15, 2002. Equal Opportunity/Affirmative Action Employer

ASSISTANT PROFESSORSHIP Bioinformatics/Genomics Department of Molecular, Cellular, and Developmental Biology University of Colorado

MCD Biology solicits applications from candidates who use genomic information and bioinformatic techniques to answer basic biological questions. This tenure-track position would begin in fall 2003. Interested Scientists should send curriculum vitae, list of publications, and a short summary of scientific interests. Further, they should arrange that three knowledgeable scientific references write letters characterizing their research work and personal qualities, all to be sent to:

> **Bioinformatics** Department of MCD Biology University of Colorado Boulder, CO 80309-0347 Website: http://mcdb.colorado.edu/

Applications will be reviewed beginning November 20, 2002, and continue until the position is filled. The University of Colorado is an Equal Opportunity/

POSITIONS OPEN

INSECT BIOLOGY MARINE BIOLOGY

California State University, Fullerton

The Department of Biological Science, California State University, Fullerton, invites applications for two full-time tenure-track positions at the ASSIST-ANT PROFESSOR level to begin August 2003. (1) Insect biology (or other terrestrial arthropods): Preferred research areas include but are not limited to physiological ecology, behavioral ecology, or evolutionary biology with an emphasis on populations. (2) Marine biology: Preferred research areas include but are not limited to coastal or estuarine/salt marsh ecology, evolutionary biology, or population genetics. We are interested in candidates who can contribute to the study of organisms, populations, or communities in arid-land or coastal-marine ecosystems as part of Departmental emphases in biodiversity, ecology, and conservation biology and marine biology. Applicants should have a Ph.D. and preferably at least two years of postdoctoral experience. The successful candidates will be expected to maintain active, externally funded research programs involving undergraduate and M.S. students and be committed to excellence in teaching at both levels. The successful candidates will develop upper-division/M.S.-level elective courses in their areas of expertise and be capable of teaching an inquirybased, lower-division core course in either evolution and biodiversity or principles of physiology and ecology. CSUF is located in a coastal Mediterranean climate within two hours of desert, montane, chaparral, coastal sage scrub, marine, estuarine, and island habitats. The university is also a member of CSU consortia for Desert Studies and for Ocean Studies and is situated near many other major universities that offer possibilities for collaboration. Send curriculum vitae (including a history of grant support), reprints of re-cent peer-reviewed publications, statements of (1) re-search interests and plans and (2) teaching philosophy and experience, and have three letters of recommendation sent to: Insect/Marine Search Committee, Department of Biological Science, California State University, Fullerton, Fullerton, CA 92834-6850. Website: http://biology.fullerton.edu/. Review of applicants will begin November 18, 2002, and continue until a suitable candidate is appointed. Salary is competitive and commensurate with experience and qualifications. CSUF is an Affirmative Action/ Equal Opportunity/Title IX/Americans With Disabilities Act Employer. Women and minority candidates are particularly encouraged to apply.

FACULTY POSITION Language Neuroscience McGill University

The School of Communication Sciences and Disorders of McGill University invites applications for one junior tenure-track appointment at the ASSIST-ANT/ASSOCIATE PROFESSOR level. The selected candidate will have the opportunity to participate in a major multidisciplinary initiative at McGill including collaborations with the recently established Centre for Research on Language, Mind, and Brain; the Montreal Neurological Institute; and the Lady Davis Institute of the Sir Mortimer B. Davis Jewish General Hospital, all of which have benefited from an expansion of experimental facilities made possible by grants from the Canada Foundation for Innovation. We are particularly interested in applicants with an established record of research in the neural bases of higher levels of language processing. Expertise in multimodal neural imaging techniques (e.g., MEG, TMS, ERP, fMRI, PET) is preferred. Interested applicants should send their curriculum vitae and a short statement of research interests; selected reprints; and arrange for three letters of recommendation to be sent directly to: Marc D. Pell, Ph.D., School of Communication Sciences and Disorders, McGill University, 1266 Pine Avenue West, Montreal, QC H3G 1A8, Canada by December 1, 2002. All qualified candidates are encouraged to apply; however Canadians and permanent residents will be given priority. McGill University is committed to Equity in Employment.

POSITIONS OPEN

TENURE-TRACK FACULTY POSITIONS Westminster College Department of Biology

The Biology Department at Westminster College invites applications for two tenure-track positions at the ASSISTANT PROFESSOR level in evolution and biodiversity starting in fall 2003. The first position is in developmental/evolutionary biology with teaching responsibilities in developmental biology and evolution. Candidates must have a background in both classical and molecular developmental biology and may contribute to new majors in bioinformatics and biochemistry. The second position is in organismic biology with teaching responsibilities in biodiversity and a field course in their area of specialty. Both positions will be expected to contribute to introductory courses in the major and to the College's liberal studies program. Candidates must have a Ph.D. in biology or be near completion and be committed to excellent teaching in a liberal arts environment.

Westminster College is a coeducational, liberal arts institution with historical ties to the Presbyterian Church. The College enrolls about 1,500 full-time students and employs approximately 100 full-time faculty. It is located in a beautiful rural setting in close proximity to both Pittsburgh, Pennsylvania, and Cleveland, Ohio. The Biology Department is housed in a modern science building with excellent teaching, research, and computing facilities.

To apply, send a letter indicating which position you are interested in along with unofficial academic transcripts; curriculum vitae; and a description of teaching experience. Also include a statement of teaching philosophy addressing ability and desire to teach lecture and laboratories in the courses listed above. Arrange to have three letters of recommendation sent separately. All information should be re-ceived by November 15, 2002. Send materials to: Dr. Ann E. Throckmorton, Department of Biology, Westminster College, New Wilmington, PA 16172

Equal Opportunity Employer.

MOLECULAR BIOLOGY AND BIOINFORMATICS

The Department of Biology at Saint Louis University, a Catholic Jesuit Institution dedicated to education, research, and health care, is seeking applications for a tenure-track ASSISTANT PROFESSOR in molecular biology and bioinformatics using integrative approaches within genome function/evolution, protein structure, and/or macromolecular interactions. The successful candidate is expected to develop an independent, extramurally funded research program. The candidate will also provide instruction in molecular biology, bioinformatics, and courses in their area of expertise. A competitive start-up package is provided. Applicants should have a Ph.D., postdoctoral experience, and a record of research productivity. Submit by postal mail curriculum vitae, statements of teaching and research goals, reprints, and three letters of recommendation to: Dr. Richard L. Mayden, MBB, Department of Biology, Saint Louis University, 3507 Laclede Avenue, St. Louis, MO 63103-2010. Information about the Department and position is at website: http://bio.slu.edu. Review of applications will begin November 1, 2002.

Saint Louis University is an Affirmative Action/Equal Opportunity Employer and encourages nominations and applications of women and minorities.

REASEARCH ASSISTANT PROFESSOR and POSTDOCTORAL RESEARCH ASSOCIATE positions available to work on alveolar epithelial cell and molecular biology. Specific areas include (among others) regulation of differentiation in vitro and in transgenic models, stem cell homing, and development of vectors for gene transfer. Send curriculum vitae and contact information for three references to: Zea Borok, M.D., University of Southern California, Department of Medicine, IRD 620, 2020 Zonal Avenue, Los Angeles, CA 90033. E-mail: zborok@usc.edu; FAX: 323-442-2611.

Nondiscrimination Institution.

THE STATE UNIVERSITY OF NEW JERSEY RUTGERS

Faculty Position in Genetics of Addiction Rank Open

The Department of Genetics and the Center of Alcohol Studies of Rutgers University are jointly seeking an outstanding scientist to fill a new position in human genetics. Researchers investigating genetic aspects of addictions and co-morbid behaviors, who would like to be part of an interdisciplinary addiction research center, are encouraged to apply. Interests may be in any substance abuse and research with human subjects, with or without concurrent animal model systems, is encouraged.

Appointments will be made at a tenured or tenure-track level, consistent with candidates' credentials. Candidates must have either a Ph.D. an M.D. or both, a demonstrated ability to conduct and publish significant independent research, and an interest in teaching at the graduate and undergraduate levels. Senior level candidates must have a strong record of grant support.

The successful candidate will also join a newly established Human Genetics Institute, and join a growing and vibrant life sciences community on Rutgers' Busch Campus, the site of the Waksman Institute, the Center for Biotechnology and Medicine, the Center for Alcohol Studies, the Environmental and Occupational Health Sciences Institute and the Robert Wood Johnson Medical School. This campus is located in central New Jersey with easy access to New York City, beaches, and countryside.

The web site for the Department of Genetics is lifesci.rutgers.edu/~genetics. Applicants should email a CV, a statement of research interests, and addresses of three references to brzustowicz@biology.rutgers.edu, or mail that information to: Dr. Linda Brzustowicz, Rutgers University, Nelson Biological Laboratories, 604 Allison Rd., Piscataway, NJ 08854-8082. Application review begins April 1, 2002 and ends when appointments are made. Starting dates are flexible.

Rutgers University is an Equal Opportunity/Affirmative Action Employer.

Department of Health and Human Services National Institutes of Health National Cancer Institute

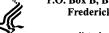


Tumor Angiogenesis Postdoctoral Positions

With nationwide responsibility for improving the health and well-being of all Americans, the Department of Health and Human Services oversees the biomedical research programs of the National Institutes of Health and those of NIH's research Institutes.

Postdoctoral positions are available in the Tumor Angiogenesis Section of the Mouse Cancer Genetics Program (MCGP), National Cancer Institute (NCI), National Institutes of Health (NIH), Department of Health and Human Services (DHHS) in Frederick, Maryland. The section focuses on the identification of molecules involved in human tumor angiogenesis and utilizes mouse models to translate new molecular information on angiogenesis into the development of novel diagnostics and therapeutics for cancer. Individuals with experience in gene knockouts, molecular genetics and protein purification are encouraged to apply. Interested applicants must possess a Ph.D. or equivalent and have no more than five years of postdoctoral experience. Interested individuals should send a statement of their research interests and goals, curriculum vitae and bibliography and three letters of reference to:

Dr. Brad St. Croix c/o Linda Brubaker Mouse Cancer Genetics Program NCI-Frederick P.O. Box B, Building 539, Room 229



Frederick, MD 21702-1201 or



e-mail to brubaker@ncifcrf.gov

HHS and NIH are Equal Opportunity Employers

nature **Senetics**

Seeks a CHIEF EDITOR

Nature Genetics seeks to appoint a chief editor to succeed Bette Phimister, who is leaving after six years with the journal. This challenging job represents a unique opportunity to influence the development of a major scientific journal, both in print and on-line.

Nature Genetics was founded in 1992, and has established itself as the most prestigious and influential journal in its field. It publishes research papers of exceptional significance in all areas of genetics. The new editor will be expected to maintain and enhance the journal's reputation, and to play a leading role in shaping its future.

The editor is responsible for all aspects of editorial content, including research articles, news and views, reviews and editorials. A strong research background and publication record is essential; editorial and managerial experience would also be advantageous, but the most important attributes will be breadth of intellectual interests, enthusiasm for communicating science to a broad readership, and excellent judgment across a broad range of biological topics.

As a visible member of the international scientific community, the editor will be expected to develop an extensive worldwide network of contacts, and to travel regularly to scientific meetings. He/she will also be responsible for managing the editorial staff of the journal, and for contributing to the publishing strategy for *Nature Genetics* and Nature Publishing Group as a whole.

Please send a resume, a short (500-1000 words) News and Views style article on an exciting and newsworthy recent development in any area of genetics, and a cover letter explaining your interest in the position, to: Human Resources Dept., 345 Park Avenue South, New York, NY 10010 (fax 212-696-9594; email admin@natureny.com), to arrive no later than 1 November.



POSTDOCTORAL FELLOW

Genetic Instability Research

Rochester, Minnesota, U.S.A

A postdoctoral position is available to study chromosomal instability mechanisms in human cancer. Ongoing studies focus on the mitotic checkpoint, a molecular network that helps to ensure faithful segregation of duplicated chromosomes during mitosis. Our studies utilize gene knockout mouse technology, general biochemical and molecular techniques, gene expression microarrays and light, electron and confocal microscopy. Scientists who have recently received a Ph.D. degree with experience in cell and molecular

Salary will be determined by the successful candidate's experience. There is an attractive benefit package. Mayo Clinic is a not-for-profit organization. Mayo integrates research with clinical practice and education in a multi-campus environment. For further information please visit http://www.mayo.edu/research/.

biology, biochemistry, and mouse work are encouraged to apply.

Applications, including curriculum vitae and bibliography, summary of past accomplishments, and the names of three references, should be sent to:

Jan van Deursen, Ph.D.
Associate Professor
Biochemistry and Molecular Biology
Guggenheim 10
200 First Street SW
Rochester, MN 55905
507-284-2524/507-266-0340
vandeursen.jan@mayo.edu

Mayo Foundation is an Affirmative Action and Equal Opportunity Employer and Educator,

MOLECULAR GENETICS/BIOINFORMAT-ICS. The University of Louisiana at Monroe invites applications for a tenure-track ASSISTANT PRO-FESSOR position beginning fall 2003. The new position will be a joint appointment between the Museum of Natural History (MNH) Zoology Division and the Biology Department. We seek candidates using gene-sequencing technologies and computational methods in evolutionary studies. Preference will be given to individuals having experience working with natural history collections. The MNH houses significant, nationally recognized collections of fishes, amphibians and reptiles, archeological artifacts, and plants. The successful candidate will develop an extramurally funded research program involving undergraduate and graduate (M.S.) students and teach undergraduate and graduate courses in specialty and introductory courses. The position is halftime research; generous start-up funds are available through an NIH grant to establish a new molecular laboratory in the Zoology Division of the museum. Applicants must have a Ph.D. and a commitment to excellence in teaching. Teaching and postdoctoral experience preferred. Submit curriculum vitae, statements of teaching and research interests, up to three reprints, unofficial transcripts, and names and contact information for three references to: Dr. Frank Pezold, Chair, Molecular Genetics Search Committee, Museum of Natural History, 207 Hanna Hall, The University of Louisiana at Monroe, Monroe, LA 71209-0504. For further information, visit the museum and Biology Department websites: http://www.ulm.edu/~pezold/museum.htm or http://www.ulm.edu/biology/biology.html. Review of applications will begin November 1, 2002, and continue until the positions are filled. ULM is an Affirmative Action/Equal Opportunity Employer.

FACULTY POSITIONS Population Genetics and Physics

Tenure-track ASSISTANT PROFESSOR positions in physics and population genetics will be available in the Department of Biological and Physical Sciences at Kennesaw State University beginning August 2003. Preference will be given to applicants with demonstrated excellence in teaching at the college level. Applicants should have postdoctoral research experience and a strong potential for developing an externally funded research program involving undergraduates. An earned Doctorate in an appropriate discipline is required. Review of applications will commence on November 1, 2002, and will continue until the position is filled. Submit a letter describing qualifications for the position; a statement of teaching philosophy; a statement of research interests; current curriculum vitae; graduate transcripts; and the names, addresses, telephone numbers, and e-mail addresses of three references to: Dr. Ted LaRosa, Physics Search Committee (e-mail: ted@avatar. kennesaw.edu) or Dr. Dale Lynn Vogelien, Population Genetics Search Committee (e-mail: dvogelie@kennesaw.edu), Department of Biological and Physical Sciences, Number 1202, Kennesaw State University, 1000 Chastain Road, Kennesaw, GA 30144-5591.

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

Two POSTDOCTORAL POSITIONS available in a shared laboratory. Position One entails study of single molecule enzyme kinetics using fluorescence microscopy. This project also involves enzyme mechanisms and site-specific mutagenesis. Experience in enzymology and/or fluorescence microscopy desirable. Position Two involves application of NMR, fluorescence, and other biophysical methods to study the folding and assembly of ribonucleoprotein complexes. Possibilities for collaborations between the two projects exist. Send curriculum vitae and e-mail addresses and telephone numbers of references to: Position One: Professor Gordon G. Hammes; hamme001@mc.duke.edu, e-mail: Position Two: Professor Terrence G. Oas; e-mail: t.oas@ duke.edu, Department of Biochemistry, Box 3711, Duke University, Durham, NC 27710. Duke University is an Equal Opportunity Employer.

POSITIONS OPEN

The University of Louisville, James Graham Brown Cancer Center, Division of Radiation Oncology, seeks to fill one or two tenure-track positions at AS-SISTANT, ASSOCIATE, or FULL PROFESSOR level in the general area of radiation biology. Applicant must have a Ph.D. and/or M.D. and post-doctoral experience. More senior applicants will be expected to have a strong track record of publications and an independently funded research program. Candidates with clear evidence of scientific innovation without regard to subdiscipline are encouraged to apply. The successful candidate(s) will join a cadre of Investigators at the University of Louisville working on novel approaches to the therapy of cancer.

Our rapidly growing Brown Cancer Center and the University of Louisville house excellent shared facilities for molecular and cellular biology including flow cytometry and cell sorting; DNA sequencing; proteomics; molecular modeling; state-of-the-art mass spectroscopy; transgenic facilities; and a molecular imaging research center with in-house cyclotrons, high-resolution NMR, and combined PET/CT devices. Please send letter of application, curriculum vitae, a synopsis of research interests, and the names and telephone/FAX/e-mail addresses of at least three references to:

William J. Spanos, M.D. Chairman, Radiation Oncology James Graham Brown Cancer Center University of Louisville 529 South Jackson Street Louisville, KY 40202

The University of Louisville, James Graham Brown Cancer Center, is an Affirmative Action/Equal Opportunity Employer.

TENURE-TRACK OR TENURED FACULTY POSITION Cell Biology

The Department of Biological Sciences at Louisiana State University invites applications for a position in cell biology at the ASSISTANT, ASSOCIATE, or FULL PROFESSOR rank. A Ph.D. or equivalent degree and postdoctoral experience are required. The successful candidate will be expected to establish and maintain an extramurally supported research program, supervise graduate students, and teach at the graduate and undergraduate levels. LSU is classified as a Research Intensive University by the Carnegie Foundation and offers competitive salary and start-up packages. The Department of Biological Sciences has over 100 Ph.D. students and has recently expanded into a new Life Sciences annex. Applicants are encouraged to visit our website: http://www.biology.lsu.edu to learn about the Department and our areas of research emphasis. Review of applications will begin November 15, 2002, and will continue until a suitable candidate is identified. Send curriculum vitae, a statement of research and teaching interests, and three letters of recommendation to: Cell Biology Search Committee, c/o Dr. James Moroney, Department of Biological Sciences, 202 Life Sciences Building, LSU, Baton Rouge, LA 70803. Reference Log Number 0324. E-mail: btmoro@. lsu.edu.

LSU is an Equal Opportunity/Equal Access Employer.

POSTDOCTORAL RESEARCH POSITIONS Institute for Quantum Information California Institute of Technology

The Institute for Quantum Information at the California Institute of Technology will have Postdoctoral Scholar positions available beginning in September 2003. Researchers interested in all aspects of quantum information science are invited to apply. Curriculum vitae; publication list; statement of research interests; and three letters of recommendation should be sent by January 15, 2003, to: Institute for Quantum Information, California Institute of Technology, MC 107-81, Pasadena, CA 91125-8100 U.S.A. E-mail: aharvey@caltech.edu.

The California Institute of Technology is an Equal Opportunity/Affirmative Action Employer. Women, minorities, veterans, and disabled persons are encouraged to apply.

POSITIONS OPEN

FACULTY POSITIONS Human Environmental Exposure/ Risk Assessment and Watershed Contaminant Modeling

The Department of Environmental Health Sciences of the University of South Carolina invites applications for two nine-month, tenure-track positions. Position One is at the ASSISTANT or ASSOCIATE PROFESSOR level with an emphasis in human environmental exposure, risk assessment, or industrial hygiene. Desirable areas of scholarship include epidemiologic, genomic, or biomarker approaches to exposure/risk characterization. Position Two is at the AS-SISTANT or ASSOCIATE levels with an emphasis in characterization/modeling of watershed-scale contaminant loadings, fate, transport, and/or effects. Scholarship in land-use impacts on water quality factors relevant to environmental quality and human health is desirable. Successful candidates will have postdoctoral or faculty experience and records of excellence in externally funded research and scholarship or strong evidence of the ability to develop such research programs. The Department is graduate only with nine full-time faculty and approximately 60 graduate students and over 50 extramural grants and contracts. Submit curriculum vitae, a statement of teaching/research interests, and names and contact information (including e-mail addresses) of three references to: Dr. Tom Chandler, c/o SEARCH, Department of Environmental Health Sciences, HESC Room 311, University of South Carolina, Columbia, SC 29208. Affirmative Action/Equal Opportunity Employer.

MICROBIOLOGIST: ASSISTANT PROFESSOR, tenure-track position in biological sciences, August 2003. Ph.D. required. Strong commitment to teaching. Teaching assignments include general and pathogenic microbiology, immunology, and courses in area of interest. Typical course loads per semester consist of two courses with laboratories. Other expectations include advising; service; and development of a research program, which includes supervision of undergraduate- and Master's-level students. Send letter of application describing teaching and research interests applicable to an undergraduate- and Master's-level institution; curriculum vitae; unofficial transcripts; and names, addresses, e-mail addressess, and telephone numbers of four references to: Chair, Screening Committee, Department of Biological Sciences, Emporia State University, 1200 Commercial, Campus Box 4050, Emporia, KS 66801. Website: http://www.emporia.edu. Review of applications begins November 4, 2002, and will continue until position is filled.

An Affirmative Action/Equal Opportunity Employer Institution, Emporia State University encourages minorities and women to apply.

MICROBIOLOGIST: Applications are invited for a tenure-track ASSISTANT PROFESSOR position beginning August 2003. We seek an individual with a strong commitment to liberal arts education, demonstrated excellence in teaching, and the ability to develop an active research program that involves undergraduates. Teaching duties include a teamtaught introductory biology course in physiology and ecology, an upper-level course in microbiology, an investigative laboratory course and junior seminar in the candidate's area of expertise, and participation in collegewide freshman-sophomore seminars that emphasize writing and speaking. Excellent research and teaching facilities are available, as are start-up funds. Send letter of application, curriculum vitae, statements of teaching philosophy and research interests, and three letters of recommendation by 15 November 2002 to: Dr. Ronald Mumme, Chair, Department of Biology, Allegheny College, 520 North Main Street, Meadville, PA 16335. E-mail: rmumme@allegheny.edu. Department website: http://www.allegheny.edu/acadmics/Biology/. Allegheny College is an Equal Opportunity Employer. Women and minorities are encouraged to apply.



Nebraska Center for Virology Univeristy of Nebraska Assistant Professor Position in Virology

Our newly established NIH-funded Nebraska Center for Virology invites applications for a tenure track position. We offer state-of-the-art core facilities in microscopy, bioinformatics, structural biology, and a research-intensive environment dedicated to understanding basic mechanisms of viral pathogenesis, immunity, host interactions and replication.

Candidates must show exceptional promise towards establishing an independent research program in one of the following areas: Viral Immunology, Pathogenesis, or Host Cell Interactions. Requirements include a PhD and/or MD, relevant post-doctoral research experience and demonstrated research abilities. Faculty is expected to develop an active, extramurally funded research program and be involved in undergraduate and graduate student teaching. Excellent opportunities for collaboration within the Center and with other University departments exist.

Postdoctoral and Predoctoral Fellowhsips Also Available

Postdoctoral fellowships in virology are awarded to candidates dedicated to virology research with a track record of research accomplishments. Motivated Postdoctoral candidates with a PhD and/or MD in microbiology or a related field and Predoctoral students with an interest in virology are encouraged to apply. Training preceptors include: Clinton Jones, PhD - Herpesvirus Latency; Jim Van Etten PhD - Chlorella Viruses; Robert Weldon, Jr., PhD - Retrovirus Assembly; Charles Wood, PhD - HIV and Kaposi's Sarcoma-Associated Herpesvirus Pathogenesis; Luwen Zhang, PhD - Interferon Regulatory Factor 7: Asit Pattnaik PhD - RNA viruses.

Review of candidates for faculty position begins November 15, 2002. The position will remain open until a suitable candidate is found. Submit CV, description of research interests and names of 3 references to: Dr. Charles Wood, Director, Nebraska Center for Virology, School of Bio. Sciences, UNL, E249 Beadle, Lincoln, NE 68588-0666. Ph (402) 472-4550; Fax (402)472-8722; cwood1@unl.edu. Website: http://www.unl.edu/virologycenter

The University of Nebraska is committed to a pluralistic campus community through affirmative action and equal opportunity and is responsive to the needs of dual career couples. We assure reasonable accommodation under the Americans with Disabilities Act. Contact Jolene Walker (402) 472-4560 for assistance.



NEUROBIOLOGY TENURE-TRACK FACULTY POSITIONS UNIVERSITY OF MARYLAND SCHOOL OF MEDICINE

The Department of Anatomy & Neurobiology is recruiting new tenured/tenure track faculty in neuroscience. Appointments will be made at ASSISTANT, ASSOCIATE, or FULL PROFESSOR ranks.

We are especially seeking applications from candidates who will complement the Department's existing strengths in sensory, systems and developmental neurobiology. Of particular interest are candidates using innovative molecular biological, cellular or computational approaches to understand organization/function or development/plasticity of the mammalian CNS.

Our facilities include state-of-the-art core laboratories in molecular neurobiology, imaging, neurophysiology and neuroanatomy. We offer an outstanding intellectual and collaborative environment with highly competitive salary and start-up packages. The department has NIH Program Project and Training Grants. Departmental faculty are members of the interdisciplinary Program in Neuroscience (http://neuroscience.umaryland.edu).

Successful candidates must have a Ph.D. or equivalent, evidence of productivity and innovation and the potential to establish an independently funded research program. For best consideration, applications should be received before November 30, 2002. Candidates should submit a detailed curriculum vitae, a statement of research interests and goals, and the names and addresses of three to five references. Electronic submission of all application materials (including supporting letters), as Microsoft Word file attachments to facsearch@umaryland.edu, is preferred. Paper applications may be mailed to: Drs. Frank Zufall & Steven D. Munger, Co-Chairs, Faculty Search Committee, Department of Anatomy and Neurobiology, University of Maryland School of Medicine, 685 West Baltimore St., Baltimore, MD 21201; http://neurobiology.umaryland.edu.

We are eager to diversify our faculty. Women and minorities are encouraged to apply. The University of Maryland is an AA/EOE/ADA employer.

Plant Root Genomics



Functional Genomics of Root Growth and Root Signaling Under Drought Postdoctoral Positions (5)

A Plant Root Genomics Consortium was recently funded by NSF to study root genetics and physiology. The collaborative project includes scientists from the University of Missouri at Columbia, Donald Danforth Plant Science Center in St. Louis, and University of Illinois at Urbana-Champaign. Our broad aim is to elucidate the mechanisms of root growth and root to shoot signaling under drought conditions. We seek individuals with experience in molecular biology, plant physiology, biochemistry, expression profiling, mass spectrometry and bioinformatics. For more information about the positions see: http://rootgenomics.missouri.edu



at Urbana-Champaign





University of Missouri at Columbia



Donald Danforth Plant Science

ANNOUNCEMENTS

MOLECULAR BIOLOGY FOR THE ENVIRONMENT AN EU-US SHORT COURSE IN ENVIRONMENTAL BIOTECHNOLOGY

February 2-16, 2003

National Center for Biotechnology at the campus of the Autonomous University of Madrid

This two-week advanced course is open to senior graduate students and junior postdoctoral fellows who have training in molecular microbiology and/or microbial ecology and who want to apply those skills to solving environmental problems. The course is designed to provide hands-on experience in modern biotechnological methods for the analysis of microbes and their activities in the remediation of pollutants in the environment. The instructional format will involve a mixture of field trips, lectures, and intensive laboratory instruction. The course is limited to 12 EU and 12 US students. Stipends, including a travel allowance, will be provided for all participants. Directors: Victor de Lorenzo (CSIC, Madrid), Juan Ramos (CSIC, Granada), Jerome Kukor (Rutgers), and Gerben Zylstra (Rutgers). Applications will only be accepted by electronic submission through the website.

Application Deadline -- November 1, 2002

Further information and application: http://www.envbiocourse.rutgers.edu

COURSE

Smart engineers and scientists often become patent agents.

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Professor Kayton's New Patent Related Career Opportunities

RESEARCH SCIENTIST

The Department of Basic Medical Sciences, Purdue University, invites applications for a Research Scientist. The successful candidate will work with Dr. Deborah Knapp in the area of EphA2 tyrosine kinase function in urinary bladder, breast, and prostate cancer. Responsibilities include the design and conduct of laboratory experiments, coordination of activities of other laboratory personnel, and publication of study results and preparation of research grants. Requires a Ph.D. degree in cellular biology or related field, minimum of three years of postdoctoral laboratory experience, and experience in grant preparation. Experience in cancer research and knowledge of EphA2 or other receptor tyrosine kinase signaling is strongly desired. Applicant screening will begin immediately and will continue until position is filled. Applicants should submit a letter of intent, statement of professional career goals, curriculum vitae, and names of three references to: Jo Anne Sandifur, Human Resource Services, Purdue University, 1126 Freehafer Hall, West Lafayette, IN 47907-1126. E-mail: jsandifur@purdue.edu. Purdue University is an Affirmative Action/Equal Opportunity Employer.

MICROBIOLOGIST Department of Biology Appalachian State University

The Department of Biology invites applications for a TENURE-TRACK FACULTY POSITION in microbiology. Candidates must be broadly trained in bacteriology and molecular techniques used to address the physiology, genetics, and/or pathogenicity of prokaryotes. Teaching responsibilities include undergraduate courses in microbiology and a graduate course that complements the current course offerings. Candidates must have a strong commitment to undergraduate and graduate education. Responsibilities include teaching, developing a program of scholarship involving undergraduate and graduate students, and seeking extramural funding. A Ph.D. is required. Appalachian State University, a member of the University of North Carolina system, is a comprehensive university with an enrollment of 13,100. The Department of Biology (website: http://www.biology. appstate.edu) currently has 21 faculty, over 600 majors, and 31 graduate students. Submit a letter of application; curriculum vitae; description of research interests; statement of teaching interests and philosophy; and names, addresses, telephone numbers, and e-mail addresses of three references by November 15, 2002, to: Chair of the Search Committee, Dr. Mary U. Connell, Department of Biology, Appalachian State University, 572 Rivers Street, Boone, NC 28608-2027. E-mail: connellmu@appstate.edu.

Appalachian State University is an Equal Opportunity Employer.

ASSOCIATE RESEARCH SCIENTIST position available immediately in the Department of Pharmacology at Columbia University. This is an opportunity to join an interdisciplinary team investigating the molecular basis of inherited mutation-induced rhythm disturbances in the heart. The applicant should have at least three years of postdoctoral research experience in molecular biology and/or biochemistry of membrane and signaling molecular proteins. Send curriculum vitae to: Dr. Robert S. Kass, Ph.D., Department of Pharmacology, Columbia University College of Physicians and Surgeons, 630 West 168th Street, New York, NY 10032. Columbia University is an Affirmative Action/Equal Opportunity Employer.

POSTDOCTORAL POSITION available immediately for two- to three-year funded project. Research is focused on the development of nucleic acid aptamers as tumor diagnostic and therapeutic agents. Experience in molecular biology required and small animal work desirable. Send curriculum vitae and three letters of recommendation to: Dr. Thomas Schmittgen, Division of Pharmaceutics, Ohio State University College of Pharmacy, 500 West 12th Avenue, Columbus, OH 43210. E-mail: schmittgen.2@osu.edu.

POSITIONS OPEN

RESEARCH MOLECULAR BIOLOGIST (PLANTS) RESEARCH PLANT MOLECULAR GENETICIST GS-0401-12/13

The U.S. Department of Agriculture, Agricultural Research Service, Wheat, Sorghum, and Forage Research Unit, which is stationed on the East Campus, University of Nebraska-Lincoln, is seeking a Research Molecular Biologist/Research Plant Molecular Geneticist GS-0401-12/13. Salary range is \$54,275 to \$83,902 and is commensurate with experience. Candidates must be U.S. citizens. Scientist will be a member of a research team developing elite sorghum germplasm with improved grain yield and quality and with genetic resistance to diseases. The incumbent will use molecular genetics technologies and biochemical/physiological methodologies and associated analytical tools to indentify, characterize, and facilitate the transfer of desirable genes affecting yield, grain and biomass quality, and disease resistance to sorghum germplasm for use in breeding programs. Candidates must have a degree in plant molecular biology or plant molecular genetics or a related scientific discipline. The position has specific education and experience requirements that must be addressed. These include advanced knowledge of plant molecular biology, biochemistry, and plant physiology and skill in molecular, genomics, and/or molecular genetics techniques such as gene isolation and characterization, modern protein isolation/ identification techniques, and mapping and cloning of plant genes. In order to ensure submission of a complete application, applicants must request a copy of the Vacancy Announcement by calling Telephone: 301-504-1484 or by printing from the website: http://www.afm.ars.usda.gov/divisions/hrd/index.html and referencing position ARS-X2W-2384. Additional information on the position can be obtained by contacting: K. P. Vogel; Telephone: 402-472-1564. Applications must be postmarked by October 30, 2002. USDA/ARS is an Equal Opportunity Employer and Provider.

UNIVERSITY OF ILLINOIS AT CHICAGO, DEPARTMENT OF CHEMISTRY, invites applications for a tenure-track ASSISTANT PROFES-SOR of biochemistry beginning fall 2003. Appointments at higher levels are possible in exceptional cases. The successful candidate will be expected to carry out a full and vigorous program of innovative research and to contribute to the teaching of graduate and undergraduate students. We will consider outstanding candidates in any area of biochemistry including chemical biology and structural biology. Please submit applications including curriculum vitae; list of publications; summary of past research; plan for future research; and letters of reference from three individuals who know the candidate's work well by October 18, 2003, to: Wonhwa Cho, Chair, Biochemistry Search Committee, Department of Chemistry (M/C 111), The University of Illinois at Chicago, 845 West Taylor Street, Chicago, IL 60607-7061. UIC is an Affirmative Action/Equal Opportunity Employer.

SCIENTIST: Develop, scale up, and support validation of purification processes for human vaccine antigens with a focus on bacterial proteins and polysaccharides. Perform development studies on chromatography, diafiltration, ultrafiltration, precipitation, and filtration processes. Evaluate experiments using protein and polysaccharide assays including HPLC, kinetic and turbidimetric analyses of endotoxins, Western blotting, ELISA, ion exchange, and affinity chromatography techniques. Utilize advanced statistical and experimental design techniques; conduct bench and scale-up experiments to define process parameters for manufacturing processes. Supervise and train laboratory staff. Serve as project leader for development and technology transfer projects. Requirements: Ph.D./biochemistry/biochemical engineering or related field and two years of experience in biopharmaceutical environment. Résumé to: Brad McNickle, Director of Human Resources, Wyeth Vaccines, 4300 Oak Park, Sanford, NC 27330.

POSITIONS OPEN

ASSISTANT PROFESSOR POSITION University of California, Irvine

Assistant Professor position is immediately available for research focused on mouse models of human breast cancer by conditional inactivation of p53 and BRCA1 and the biological and biochemical functions of the checkpoint/repair genes ATM/ATR/NBS1. Our recent publications: Nature 405:473; 406:210; J. Biol. Chem. 274:12748; Proc. Natl. Acad. Sci. 98:13102; Tumor models. Cancer Res. 57:4123; Oncogene 20:6742 and 7073. Annual salary range is \$49,700 to \$55,200 depending on research experience. A Ph.D. degree and postdoctoral experience are required. Training and experience in molecular and cell biology, mouse knockout, and grant writing preferred. Potential for becoming a Principal Investigator with independent grant funding. Prospective candidates should forward their curriculum vitae and three references to:

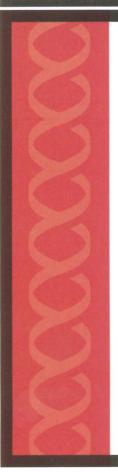
Dr. Eva Lee, Professor
Department of Developmental and
Cell Biology and
Department of Biological Chemistry
University of California, Irvine
Irvine, CA 92697-1700
E-mail: elee@uci.edu

Closing date: November 15, 2002.

The University of California, Irvine, is an Equal Opportunity Employer committed to excellence through diversity.

PLANT ECOLOGIST. North Central College invites applications from broadly trained Plant Ecologists for a tenure-track appointment at the ASSIST-ANT or ASSOCIATE PROFESSOR level to begin September 2003. Ph.D. required; postdoctoral experience preferred. Applicants should have a strong commitment to excellence in teaching and under-graduate research. Teaching assignments include courses in ecology, botany, and environmental biology. The successful candidate will have the opportunity to develop additional courses in her/his area of expertise including field courses. Additionally, the successful candidate will participate in our introductory biology sequence and direct undergraduate students in research. North Central College, located 30 miles west of Chicago in Illinois' research and development corridor, is a 141-year-old comprehensive liberal arts college of 2,500 students with a strong tradition in biology. For more information, see website: http:// www.noctrl.edu/biology. Send letter of applica-tion, curriculum vitae, outline of undergraduate research plans, statement of teaching philosophy, graduate and undergraduate transcripts, and have three letters of recommendation sent to: Dr. Thomas Williams, Search Committee Chair, c/o Academic Affairs Office, North Central College, P.O. Box 3063, Naperville, IL 60566-7063. Review of applications begins December 2, 2002, and continues until the position is filled. We strongly encourage applications from women and minority candidates. Equal Opportunity Employer.

The Division of Immunogenetics in the Department of Pathology at Columbia University invites applications for two STAFF ASSOCIATE positions in the field of molecular and cellular immunology. Duties and requirements for each position are as follows: (1) Design and implement protocols and research in molecular immunology. Requirements are a Ph.D. or equivalent with at least two years of postdoctoral experience in molecular immunology and protein chemistry. Expertise in signal transduction and molecular biology is highly desirable. (2) Design and perform experiments in the field of cellular immunology. Flow cytometry, ELISA, and PCR analysis of lymphocyte differentiation antigens for the characterization of leukemia/lymphoma and immunodeficiency. Requirements are a B.S. and at least four years of experience in the field of cellular immunology and flow cytometry. Send curriculum vitae and the names of three references to: Dr. Nicole Suciu-Foca, Pathology/Immunogenetics Division, Columbia University, 630 West 168 Street, New York, NY 10032. Columbia University is an Equal Opportunity/ Affirmative Action Employer.



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Invitrogen's Research Tools Development Grants Program provides funding for investigators developing innovative tools for use in life science research, including investigators working in academics, not-for-profit institutions, and for-profit companies. Total funding is US\$5 million per year, with annual individual awards of up to US\$100,000. Grants are provided quarterly; each quarter focuses on a specific field of interest.

Fourth quarter 2002 funding is for the area of **amplification**, **labeling and quantitation** of nucleic acids—including proposals for the *in vitro* or *in vivo* applications of detection, expression, hybridization, microarrays, and screening. Deadline for full Grant Proposals is December 1. A preproposal is required prior to submitting a Grant Proposal. **For more information**, **visit www.invitrogen.com**, **e-mail grants@invitrogen.com**, or call 800 955 6288, ext. 66140 (760 476 6140).

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P.C. Rossin College of Engineering and Applied Science



COMPUTATIONAL BIOENGINEERING BIOENGINEERING/APPLIED LIFE SCIENCE INTERDISCIPLINARY PROGRAM

Lehigh University seeks either an Assistant Professor in computational bioengineering or an **Associate/Full Professor** in the same field who will also serve as the Director of the Bioengineering/Applied Life Science interdisciplinary program. Possible fields of interest include protein structure predictions, rational drug design, metabolic engineering, and bioinformatics. Candidates must have a Ph.D. in Bioengineering, Chemical Engineering, Computational Biology or a closely related field. A record of research scholarship, funding, accomplishment in teaching, and service is anticipated that is distinguished and appropriate to the level of appointment. The candidate at the senior level will need to have demonstrated leadership, excellent interpersonal skills, administrative talents and a commitment to excellence and innovation in education.

As part of a new \$75M plan for the future, Lehigh University is investing in four research initiatives, one of which is Bioscience/Biotechnology. The academic program in Bioengineering/Applied Life Science involves departments from the College of Arts and Science as well as Engineering and Applied Science.

The position will remain open until a suitable candidate has been found, although applications received after November 29, 2002, cannot be assured of consideration. Candidates should send curriculum vitae, name, address, telephone and fax number, e-mail address, four references, and a detailed statement of research plans and teaching interests to:

Professor Manoj K. Chaudhury Chair of Search Committee Department of Chemical Engineering Lehigh University, 111 Research Drive Bethlehem, PA 18015 Email: mkc4@lehigh.edu

Lehigh University is committed to recruiting, retaining, and tenuring members of underrepresented groups in Science and Engineering. Welcome to the Country of the World Cup and Asian Games!

INTERNATIONAL SYMPOSIUM ON NANOBIOSCIENCE

Paradise Hotel, Busan, Korea, Nov. 22-23, 2002

The symposium will emphasize in current and emerging areas of nanobiotechnology related to structure-function biology, celluar structures and mechanisms, biomembranes, bioenergetics, sensors, as well as biopolymers, protein structure and function.

INVITED SPEAKERS

Zewail, Ahmed Hassan
(Nobel Laureate in Chemistry, 1999)

(Nobel Laureate in Physics, 1986)

Additionally, 28 distinguished speakers will lecture at the meeting. Hundreds of Scientists from all over the world will attend the meeting.

Registration Form is also available on Web Http://www.nabicenter.org/register.htm Deadline for on-line registration; 30th Oct. 2002. (early registration bonus (\$50) is available before 15th October)

Deadline for on-line abstract and poster draft submission; 30th Oct. 2002.

Further updated information: Http://www.nabicenter.org/

POSITIONS OPEN

The Korea Institute of Nanobioscience is currently seeking candidates for the position of Assistant, Associate and Full Professor in Nanobioscience or related fields both foreign and Korean residents abroad. Applicants should send a statement of research interests, curriculum vitae, and names of three references to Professor Dr. Han Do Kim, Director, Korea Institute of Nanobioscience, Pusan National University, Busan 609-735, Korea Fax: 82-51-517-3760. E-mail: nabicenter@pusan.ac.kr.





POSTDOCTORAL FELLOWSHIP/RESEARCH ASSOCIATES Lombardi Comprehensive Cancer Center

Two Postdoctoral positions are available within the NCI-funded Lombardi Comprehensive Cancer Center examining molecular mechanisms governing hormonal regulation of breast and prostate cancer growth and metastasis.

The laboratory studies transcriptional regulation of the cell cycle and the role of the cyclin-dependent kinase inhibitors in tumorigenesis using tissue culture, transgenic models (targeted tissue-specific inducible transgenics and floxed oncogene mice), and viral gene therapy vectors.

therapy vectors.

Applicants must have a Ph.D. or equivalent. Experience in molecular biology immunohistochemistry and in situ hybridization would be beneficial.

Please send curriculum vitae and three letters of reference to e-mail: pestell@georgetown.edu.

Director, Lombardi Cancer Center
Dr. Richard G. Pestell, M.D., Ph.D., F.R.A.C.P.
Chairman, Department of Oncology
Georgetown University
The Research Building, Suite E-501
3970 Reservoir Road, N.W.
Washington, DC 20007
FAX: 202-687-6402

Equal Opportunity Employer.

A POSTDOCTORAL POSITION is open immediately at Morehouse School of Medicine, Department of Microbiology, Biochemistry, and Immunology, to investigate the mechanism(s) regulating expression of a secreted metalloprotease in Vibrio cholerae and its role in intestinal colonization and pathogenesis. Applicants with previous experience in methods applied to the analysis of transcription in bacteria such as RNA detection, transcript mapping, and the assessment of protein-DNA interactions will be considered preferentially. Morehouse School of Medicine, located in the metro Atlanta, Georgia, area, provides state-of-the-art research and core facilities. Applicants should contact: Dr. Jorge A. Benitez, Morehouse School of Medicine, Department of Microbiology, Biochemistry, and Immunology, 720 Westview Drive, S.W. Atlanta, GA 30310-1495. Telephone: 404-756-6661/6660; FAX: 404-752-1179; e-mail: jbenitez@msm.edu.

POSTDOCTORAL FELLOWSHIP for M.D., Ph.D., or M.D./Ph.D. or equivalent. To conduct experimental and spontaneous metastasis assays in rat and mice lung. Experience in small animal surgery required. Research involves tail-vein injection of fluorescent tumor cells into rats and mice, lung isolation and perfusion, fluorescence microscopy. Cell culture experience a plus. Send curriculum vitae to: Abu-Bakr Al-Mehdi, M.D., Ph.D., University of South Alabama, Department of Pharmacology, MSB 3370, Mobile, AL 36688 U.S.A. Prefer e-mail: aalmehdi@jaguarl.usouthal.edu.

A POSTDOCTORAL POSITION is available for research in applying proteomics to the study of CuZnSOD mutations in neurodegenerative diseases. Experience in neurobiology, molecular biology, or mass spectrometry is preferred. Send curriculum vitae and list of references to: Dr. Haining Zhu, Department of Biochemistry, University of Kentucky, Lexington, KY 40536-0298. E-mail: haining@uky.edu.

POSITIONS OPEN

POSTDOCTORAL POSITIONS Microbial Pathogenesis

One project will focus on the ability of an oral pathogen to move within the cytoplasm via a novel interaction with microtubules and egress into adjacent cells. Preference will be given to candidates with familiarity with microbiology, molecular biology, and biochemical techniques. The candidate should have a strong background in cell biology, preferably with an emphasis in microtubule biology.

The other project involves the study of a gene cluster conserved in *streptococci* and *staphylococci* that may represent a universal glycosylation pathway. The successful candidate will have an opportunity to be at the forefront of studies in an emerging pathogenic mechanism in bacteria. Applicants should have a Ph.D. in microbiology, carbohydrate biochemistry, or other related disciplines. Significant training and research experience in bacterial genetics is essential.

The University is located near Lake Champlain and major recreational areas as well as large metropolitan centers such as Montreal, Quebec, and Boston, Massachusetts. The Department occupies a well-equipped research building and the candidate will have opportunities to interact with Investigators with diverse backgrounds.

Send curriculum vitae to: Dr. Paula Fives-Taylor, Department of Microbiology and Molecular Genetics, University of Vermont, Burlington, VT 05405. Telephone: 802-656-1121; e-mail: pfivesta@zoo.uvm.edu. The University of Vermont is an Equal Opportunity Employer.

POSTDOCTORAL POSITION Yale University

Available immediately to study signaling pathways involved in the regulation of the tooth-bone interface during tooth growth and root extension. Current approaches include gene expression analysis by PCR-subtraction and microarray/bioinformatics. A background in bone development and/or oral biology and basic skills in molecular biology are required. A recent Ph.D. is preferred. Candidates should send a cover letter, curriculum vitae, summary of past experience, and contact information for three references to: William Philbrick, Ph.D., Department of Medicine, Yale University, Box 208020, New Haven, CT 06520-8020. FAX: 203-785-6015; e-mail: william.philbrick@yale.edu.

Yale University is an Equal Opportunity/Affirmative Action Employer.

POSTDOCTORAL RESEARCH FELLOW Departments of Pediatrics and Radiology Evanston Northwestern Healthcare Research Institute and Northwestern University

Position available immediately to study newborn brain diseases using MRI in animal models and humans. Access to state-of-the-art instrumentation in excellent locality with highly competitive pay and benefits. Candidates with a Ph.D. in physics, chemistry, engineering, or neuroscience with prior experience in MRI preferred. Send curriculum vitae to: S. Tan, M.D., or P.V. Prasad, Ph.D., 2650 Ridge Avenue, Evanston, IL 60201. Or call Telephone: 847-570-1349; FAX: 847-570-2942; email: sidtan@northwestern.edu or p-prasad2@northwestern.edu.

POSTDOCTORAL FELLOWSHIPS. Two positions available to work on immunotherapeutic approaches to cancer, infections, and/or autoimmune disease. Current projects focus on cellular immunotherapy for fungal infection and regulatory T cells for cancer and autoimmune disease. Background in human immunology required. Send curriculum vitae, statement of interests, and references to: Dr. Carolyn A. Taylor, Medical College of Wisconsin, BMT Laboratories, Froedtert Hospital Pavilion Third Floor, 9200 West Wisconsin Avenue, Milwaukee, WI 53226. Prefer e-mail: ckeever@mcw.edu.

POSITIONS OPEN

$NIH 2002 = [OPPORTUNITY]^N$

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NIH is dedicated to building a diverse community in its training and employment programs.

POSTDOCTORAL POSITIONS in Department of Obstetrics/Gynecology, University of Texas Medical Branch, are available immediately in a wellestablished laboratory. Position One: studies in vas-cular biology and blood flow regulation. Preference given to individuals with background in vascular re-search. Candidate must have Ph.D. or equivalent degree in physiology. Position Two: interdisciplinary research involving mechanisms of uterine infection. Preference given to individuals with experience in urogenital tract infection. Candidate must have a Ph.D. or equivalent degree in microbiology/cell signaling. Position Three: perinatal biology with emphasis on placental function. Preference given to in-dividuals with experience in cell/molecular biology. Candidate must have Ph.D. or equivalent degree. Opportunity exists to grow to Junior Faculty Positions. Competitive salary commensurate with experience. For immediate consideration, please send curriculum vitae and reference to: Dr. Chandra Yallampalli, Professor, Department of Obstetrics/ Gynecology, 301 University Boulevard, Galveston, TX 77555-1062. E-mail: chyallam@ utmb.edu.

POSTDOCTORAL/RESEARCH ASSOCIATE POSITION in molecular viral oncogenesis and new pathogen discovery. Position available starting July 2002. Ongoing studies involve viral regulation of cMYC, pRB, apoptotic, and interferonsignaling pathways by Kaposi's sarcoma-associated herpesvirus (Science 266:1865, 1994; PNAS 93:1487, 1996) and use of molecular techniques to find unidentified pathogens. Experience in virology, transcriptional regulation, or genomics preferred. The laboratory is located in the University of Pittsburgh Hillman Cancer Center, a newly built, free-standing 350,000-square-foot cancer research and treatment facility. Send curriculum vitae and three references by FAX ormail to: Patrick S. Moore, M.D., M.P.H. and Yuan Chang, M.D., Molecular Virology Program, University of Pittsburgh Cancer Institute, Research Pavillion, 5117 Centre Avenue, Suite 1.4, Pittsburgh, PA 15213-1863. Website: http://www.upci.upmc.edu/internet/molvirology/kshvlab.html. FAX: 412-623-7715.

POSTDOCTORAL POSITIONS Department of Pharmacology University of Minnesota Medical School at Minneapolis

Postdoctoral positions are available to study the mechanisms of RNA editing in trypanosomes and to study the relationship of mammalian iron homeostasis to cell cycle regulation. Candidates with a Ph.D. in molecular biology or biochemistry are encouraged to apply. Send curriculum vitae and the names and addresses of three references to: Greg Connell; e-mail: gconnell@lenti.med.umn.edu. For more information, please visit website: http://www.pharmacology.med.umn.edu.

Two POSTDOCTORAL POSITIONS are available at the University of Toronto to study the biochemical mechanisms of thrombosis and hemostasis [J. Clin. Invest. 106:385; Blood 98:368) and study auto- and alloimmune thrombocytopenia. Experience in platelet physiology, immunology, or molecular biology will be an asset. Motivated candidates with newly awarded Doctoral degrees and strong research backgrounds and good writing skills should send their curricula vitae to e-mail: nih@smh.toronto.on.ca.

POSTDOCTORAL POSITIONS Cellular, Molecular, Structural Biology

Postdoctoral positions are available to study the microtubule motor protein cytoplasmic dynein and the endocytic GTPase dynamin. Projects involve the role of dynein and associated proteins in mitosis, brain developmental disease, neuronal and nonneuronal cell migration, and organelle and viral transport; structure of the dynein motor domain and accessory subunits; dynein mechanochemistry; mechanisms of cargo binding; and dynamin structure/function analysis. Background in cell and molecular biology, neurobiology, or structural biology helpful. Contact: Dr. Richard Vallee, Columbia University College of Physicians and Surgeons, Director, Division of Cell and Molecular Biology, Departments of Pathology/Cell Biology and Anatomy. Send curriculum vitae by e-mail (including names of three references) to e-mail: rv2025@columbia.edu. For further information, see websites: http://pathology.cpmc.columbia.edu/vallee/ or http://cpmcnet.columbia.edu/dept/neurobeh/Vallee.html. Columbia University is an Affirmative Action/Equal Opportunity Employer.

POSTDOCTORAL RESEARCH SCIENTIST in stable isotope biogeochemistry. The Patrick Center for Environmental Research at the Academy of Natural Sciences invites applications for a broadly trained and hands-on stable isotope Ecologist/Biogeochemist to develop, utilize, and manage our stable isotope ecology facility that includes a new dual-inlet Delta Plus-EA and related equipment. We seek Ph.D. in disciplines relating to biogeochemistry, experience in ecological application of stable isotope techniques, and a record of success in research publication. For position details, visit website: http://www.acnatsi.org/learn/employment.html#855.

Send curriculum vitae, statement of research interest, postgraduate transcripts, and names/addresses/telephone and e-mail information for at least three professional references to: Isotope Biogeochemistry Search Committee, Position Number 855, Patrick Center for Environmental Research, Academy of Natural Sciences, 1900 Benjamin Franklin Parkway, Philadelphia, PA 19103-1195. E-mail: laprairie@acnatsi.org. An Equal Opportunity Employer.

POSTDOCTORAL FELLOW Neuroscience

A Postdoctoral opportunity is available in one of two areas of neuroscience. One area seeks to understand how micropatterned neuronal networks process information. The principal input/output devices will be planar and 3-D microelectrode arrays (MEAs) in small, designed networks investigating how neurons encode complex logical functions and how they learn new patterns of activity. Desired skills include neuronal cell culture, electrophysiology, microlithography, and neural modeling. The other area focuses on the role of mitochondria in brain aging. The work primarily involves fluorescence and in situ PCR measures, high-throughput screens for stress protection, and mitochondrial respiration in the context of glutamate and beta-amyloid toxicity. Desired skills include cell biology or neuroscience with a focus on neurotoxicity, in situ PCR, or respiration. This position will close October 4, 2002, or until filled. Send a résumé and three letters of reference to: Dr. Gregory J. Brewer, c/o Ms. Bea Leonard, Southern Illinois University School of Medicine, P.O. Box 19626, Springfield, IL 62794-9626 U.S.A. Website: http:// www.siumed.edu/mmi/brewer.htm

Engineering and Public Policy at Carnegie Mellon seeks DOCTORAL STUDENTS with technical backgrounds to address policy issues in electric power and other energy and environmental issues; information security and telecommunications policy; risk analysis and regulation; research and development, innovation, and development. See website: http://www.epp.cmu.edu. Victoria Massimino, Engineering and Public Policy, Carnegie Mellon, Pittsburgh, PA 15213 U.S.A.

POSITIONS OPEN

POSTODOCTORAL POSITIONS HIV

Molecular Biology

Postdoctoral positions are available in the group headed by **Dr. Jonathan Karn**, who became Chairman of the Department of Molecular Biology and Microbiology at Case Western Reserve University in July 2002. The Department has strong ties to the CWRU Center for AIDS Research and the Center for RNA Molecular Biology and is currently undergoing a period of rapid expansion.

The work of the group focuses on the HIV regulatory protein Tat. Ongoing projects range from structural studies of the complexes formed between Tat, the Tat-associated kinase (TAK/p-TEFb), and their RNA-recognition sites to biochemical and genetic studies of the mechanisms of action of Tat. For a recent review and publications, see Karn, J. Mol. Biol. 293:235-254, 1999; West and Karn, EMBO J. 18: 1378-1386, 1999; Isel and Karn, J. Mol. Biol. 290: 929-941, 1999; West and Karn, J. Virol. 75:8524-8537, 2001; Bourgeois et al., Mol. Cell. Biol. 22: 1079-1093, 2002; Kim et al., Mol. Cell. Biol. 22: 4622-4637. Experience in the biochemistry of transcription, molecular virology, and/or gene expression in mammalian cells will be beneficial. Salary and benefits will be in keeping with NIH postdoctoral levels. Travel expenses will be provided. Interested applicants should send full curriculum vitae, reprints of no more than three papers, and the names and addresses of three professional references to:

Dr. Peter Ecklund
Department of Molecular Biology
and Microbiology
Case Western Reserve University
School of Medicine
10900 Euclid Avenue
Cleveland, OH 44106-4960
FAX: 216-368-3055
E-mail: pse@po.cwru.edu

Please respond by October 1, 2002. Case Western Reserve is an Affirmative Action Employer.

RESEARCH SCIENTIST/POSTDOCTORAL POSITIONS available in microbial pathogenesis to study anthrax pathogenesis. The program is focused on the identification and molecular characterization of microbial virulence determinants and their mechanisms of action using in vitw cell culture and animal models. Characterization of the immune response to infection will also be evaluated. Position requires Ph.D. and U.S. citizenship. Experience in microbiology and cell biology desirable. Interested applicants should send their curriculum vitae, statement of research interests, and names of three references to: Dr. Arthur M. Friedlander, U.S. Army Medical Research Institute of Infectious Diseases, Frederick, MD 21702. FAX: 301-619-2152; e-mail: arthur.friedlander@amedd.army.mil.

A POSTDOCTORAL POSITION with Dr. Leslie V. Parise is available immediately for an energetic individual to study molecular aspects of integrin regulation. Background in cell or molecular biology helpful. Must have Ph.D., M.D., or equivalent. Please send or e-mail curriculum vitae and names of three references to: Dr. Leslie Parise, Department of Pharmacology, CB Number 7365, University of North Carolina, Chapel Hill, NC 27599-7365. E-mail: parise@med.unc.edu; website: http://www.med.unc.edu/wrkunits/2depts/pharm/ParisePage/Index.html. UNC Chapel Hill is an Equal Opportunity/Americans With Disabilities Act Employer.

POSTDOCTORAL POSITION available immediately to study the effects of regulatory proteins on the mechanics of single myofibrils and single optically trapped regulated thin filaments. Candidate must have Ph.D. and either experience with muscle proteins and/or muscle mechanics. Send curriculum vitae and three references to: Dr. Earl Homsher, Physiology Department, Center for Health Sciences, University of California Los Angeles, Los Angeles, CA 90095-1751. E-mail: ehomsher@mednet.ucla.edu.

POSITIONS OPEN

POSTDOCTORAL POSITION to study the mechanism of heterochromatin-mediated gene silencing in yeast (see Cell 105:403-414, 2001). Submit curriculum vitae with a brief description of research interests and names of three references to: Dr. David S. Gross, Professor, Department of Biochemistry and Molecular Biology, Louisiana State University Health Science Center, 1501 Kings Highway, Shreveport, LA 71130-3932. E-mail: dgross@lsuhsc.edu. LSUHSC is an Equal Opportunity Employer.

GLOBAL OPPORTUNITIES

LABORATORY HEAD POSITIONS Institute of Neuroscience Chinese Academy of Sciences

The Institute of Neuroscience of Chinese Academy of Sciences in Shanghai represents a major drive for neuroscience research in China. The Institute aims to implement the infrastructure of a modern research institute with an environment that stimulates rigorous scientific pursuit and fruitful interaction, a support and management system that facilitates major discoveries, a merit-based review system for promotion and funding, and a high-quality education and training program for young Neuroscientists. The Institute currently has eight laboratories in various areas of molecular, cellular, and system neurobiology. Applications are invited for Laboratory Head positions. Qualified Scientists in all areas of neuroscience will be considered. Candidates must have a Ph.D. or equivalent training with significant postdoctoral research accomplishments. The candidates are required to develop a rigorous research program and to supervise graduate students and Postdoctoral Fellows. Start-up funds, annual operating funds, competitive salary, and housing benefits will be provided. Please send curriculum vitae, representative publications, and names and e-mail addresses of three references to: **Dr.** Mu-ming Poo, Institute of Neuroscience, 320 Yue-yang Road, Shanghai 200031, China. Applications received before November 1 of every year will be considered for appointment beginning in January of the next year.

ANNOUNCEMENTS

RESEARCH JOB FAIR Friday, October 11, 2002 12 p.m. to 3 p.m. Cox Hall, Emory University Campus Atlanta, Georgia

Free parking at the Peavine Parking Deck. Faculty Scientists from the School of Medicine and the Yerkes Regional Primate Center will be available for interviews during the Job Fair.

RESEARCH TECHNICIANS (ALL LEVELS) AND POSTDOCTORAL FELLOWS

A Bachelor's degree is required for Technician positions and a Ph.D. is required for Postdoctoral Fellow positions. Preferred disciplines and experience include bacteriology, biochemistry, biology, chemistry, genetics, microbiology, molecular biology, neuroscience, virology, and zoology.

Please bring copies of your résumé for each interview. For faculty interviewers, interview times, additional details, and to obtain directions, please visit our website: http://emory.hr.emory.edu/hr/research.nsf/vwWeb?OpenViewwww.emory.edu. Affirmative Action/Equal Opportunity Employer.

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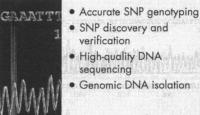


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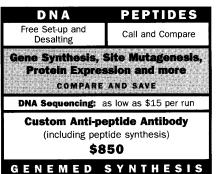


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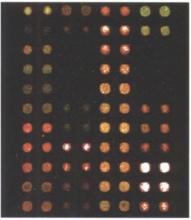
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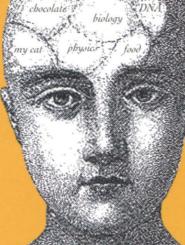
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