# E v o l D i r

September 1, 2010

M o n t h  i n  R e v i e w

## Foreword

This listing is intended to aid researchers in population genetics and evolution. To add your name to the directory listing, to change anything regarding this listing or to complain please send me mail at Golding@McMaster.CA.

Listing in this directory is neither limited nor censored and is solely to help scientists reach other members in the same field and to serve as a means of communication. Please do not add to the junk e-mail unless necessary. The nature of the messages should be "bulletin board" in nature, if there is a "discussion" style topic that you would like to post please send it to the USENET discussion groups.

Instructions for the EvolDir are listed at the end of this message.

—— / ——

# Conferences



## London Evol Interspecific Communication Dec2-3

Conference: Interspecific Communication

And the main text is:

Abstract Submission Deadline Extended (new date 31st August 2010)

Signalling and communication, in the context of sexual selection, has been one of the dominant research areas in animal behaviour for the last three decades. The 2010 Winter ASAB conference will instead focus on interspecific communication. This topic is rich in terms of extraordinary natural history and the theory needed to understand what is going on, and has profound implications for evolution and ecology. Sub-themes include: host manipulation by parasites (including brood parasites), plant-pollinator interactions, anti-predator defensive signals, the evolution of mutualism, and alarm-calling.

The plenary speakers at the main conference are:

Redouan Bshary (University of Neuchâtel, Switzerland) Lars Chittka (Queen Mary College, University of London, UK) Leena Lindstrom (University of Jyväskylä, Finland) Rob Magrath (Australian National University, Australia)

The meeting is, as always, also host to ASAB's annual Tinbergen lecture. This year's speaker is Laurent Keller of the University of Lausanne, Switzerland.

We are now seeking contributed talks and posters to complement the exceptional invited speakers. Please send abstracts of potential contributions, using the downloadable form on the ASAB website: < http://asab.nottingham.ac.uk/ >, to Adi.Whitty@bristol.ac.uk (putting 'ASAB conference' in the subject box).

Deadline for abstract submission: 31st AUGUST 2010 Registration: Free. Just turn up! Venue: Zoological Society of London meeting rooms, Regent's Park, London, UK Dates: 2nd - 3rd December, 2010

Dr A Radford BBSRC David Phillips Research Fellow School of Biological Sciences University of Bristol Woodland Road Bristol BS8 1UG Andy.Radford@bristol.ac.uk Tel: 0117-9288246

A Radford <Andy.Radford@bristol.ac.uk>

## Madison Florida SEPEEG Oct8-10

Dear All,

SEPEEG/SEEPAGE, the 2010 southeastern population ecology & evolutionary genetics meeting will be held the weekend of 8-10 October at the 4H center near Madison, Florida. The meeting will be hosted by the Department of Biology, University of Florida, Gainesville FL. Organizers: Charlie Baer and Marta Wayne. You can learn more by clicking here: http://web.me.com/mlwayne/SEPEEG_2010/-home.html. Registration will open 1 September.

Hope to see you there, Marta and Charlie

mlwayne@ufl.edu

## Marseilles 14thEvolutionaryBiology Sep21-24 4

Dear All,

We are pleased to inform you that the program of the 14th Evolutionary Biology Meeting at Marseilles, Marseilles, France, 21-24 september 2010 is available on our web site: http://sites.univ-provence.fr/evol-cgr Yours sincerely,

Axelle Pontarotti

Egee@univ-provence.fr

## ULisbon PolyploidEvolution Nov11-12 2

International meeting on the genetics of polyploids

http://polyploidymeeting.fc.ul.pt/

Dear colleagues,

the International meeting on the genetics of polyploids has updated the Important dates; you have now extra time to submit your abstract!

September 15 Deadline - abstracts submissions (polyploidymeeting@fc.ul.pt)

September 30 Decision and communication on oral/poster presentations

October 15 1st deadline for registration (reduced price)

October 30 2nd deadline for registration (full price)

The INTERNATIONAL MEETING ON THE GENETICS OF POLYPLOIDS aims at promoting knowledge exchange and discussions on the latest developments regarding the field of polyploidy. The meeting will take place next November11th-12th, 2010 at the Faculdade de CiÃncias, Universidade de Lisboa (FCUL).

The main topics to be covered in the meeting will be gene expression, genome dynamics, sex and reproduction, and will include subjects such as epigenetics, gene regulation, genome structure and evolution, heterosis, sexual differentiation and determination.

This international meeting will feature outstanding speakers in the field of polyploidy such as Luca Comai, UC Davis, USA; James Bogart, University of Guelph, Canada; Manfred Schartl, University of Wuerzburg, Germany; Roger Butlin, University of Sheffield, UK.

Angela InÃcio <mainacio@fc.ul.pt>

# GradStudentPositions

## ACWilsonCentre NZ ModelsGeneticVariation

Funded PhD Studentship Available through the Allan Wilson Centre for Study at the University of Otago, Dunedin, New Zealand

Topic: Population-Genetic Models for the Maintenance of Genetic Variation

The mismatch between empirical data showing a vast amount of genetic variation in natural populations and theoretical models predicting such levels of variation has been described as the central problem in population genetics. Recently, progress has been made in resolving this paradox by considering how selectively maintained variation may build up over time. The models underlying this research, however, assume that fitnesses are relatively unconstrained, which is often unrealistic. This project will examine the consequences for these models of incorporating constrained fitnesses using simulation techniques of mathematical modeling. The work requires some mathematical background, although a degree in mathematics is not a strict requirement.

Background reading: Trotter, M.V., and H.G Spencer. 2008. The generation and maintenance of genetic variation by frequency-dependent selection: Constructing polymorphisms under the pairwise interaction model. Genetics 180: 1547-1557.

Star, B., M.V. Trotter and H.G. Spencer. 2008. Evolution of fitnesses in structured populations with correlated environments. Genetics 179: 1469-1478.

This project would be supervised by Prof. Hamish Spencer at the University of Otago.

Should you wish to undertake study in the Allan Wilson Centre (AWC) on either an AWC Studentship or through some other funding mechanism you must either be a New Zealand citizen, hold New Zealand residency or have a study permit to study in New Zealand. The AWC is a partnership between 5 New Zealand universities and a New Zealand Crown Research Institute. The rules for the admittance of international students may vary slightly between institutions. - International students wishing to enrol at the University of Otago should read these pages.

Professor Hamish G. Spencer, FRSNZ Allan Wilson Centre for Molecular Ecology and Evolution National Research Centre for Growth and Development Department of Zoology / Te Tari o Mâtai Kararehe University of Otago / Te Whare Wânanga o Otâgo Dunedin / Ôepoti New Zealand / Aotearoa

Email: h.spencer@otago.ac.nz or hod.zoology@otago.ac.nz Postal: Department of Zoology, P.O. Box 56, Dunedin 9054 Courier: 340 Great King Street, Dunedin 9016 Phone: +64-3-479-7981 Fax: +64-3-479-7584

Departmental Website: http://www.otago.ac.nz/-zoology/staff/academic/spencer.html AWC Website: http://www.allanwilsoncentre.ac.nz/ NRCGD Website: http://www.nrcgd.org.nz/ NZ Mollusca Website: http://www.molluscs.otago.ac.nz

## CityUNewYork ConservationGenetics

A position for a PhD student at the Graduate Center, City University of New York is available through the Conservation Genetics / Molecular Ecology and Evolution laboratory of Eugenia Naro-Maciel, College of Staten Island, starting Fall 2011.

Compatible candidates should be interested in investigating relationships among and within species in order to understand patterns and processes of molecular evolution, and to inform conservation strategies. In this laboratory we use a comprehensive analytical approach to population genetics and systematics, and focus on globally endangered sea turtles as well as other marine animals and chelonians. This combination approach allows assignment of individuals to their unknown source populations, reveals relationships and differentiation among groups, and explores genetic variation within groups. This research provides unique insights into temporal and spatial patterns of genetic variation, dispersal, and migration, while enhancing basic biological knowledge of population structure and molecular evolution. By investigating population connectivity, or linkages among groups, and evolutionary history in endangered species, this program advances understanding of

central questions in evolution and conservation biology.

To fill this position the student must be accepted to the Graduate Center (please click to see information for prospective students: http://www.gc.cuny.edu/-prospective_students/index.htm).

Interested students are requested to visit the website (http://web.me.com/enaromaciel/Naro-Maciel_Laboratory/Home.html) then email a cv and cover letter, including research interests and GRE scores, to Eugenia.NaroMaciel@csi.cuny.edu

Think green before you print this email.

Eugenia NaroMaciel <Eugenia.NaroMaciel@csi.cuny.edu>

## Davos Bern Uppsala 3 PlantEcol EvolEcol EcolGenetics

Davos_Bern_Uppsala.PlantEcol_EvolEcol_EcolGenetics

Three PhD positions in Plant Ecology, Evolutionary Ecology and Ecological Genetics

We are seeking three PhD students for a new SNF-funded project about the adaptation of the long-lived alpine shrub Salix herbacea to different altitudes and habitats, and its ecological and evolutionary responses to climate change. The project is a collaboration between the Swiss Federal Institute for Forest, Snow and Landscape Research WSL in Davos, the Universities of Basel, Bern and Fribourg (all in Switzerland), and the University of Uppsala in Sweden.

The project consists of three sub-projects that are tightly linked through common field surveys and transplant experiments. The field sites are in the Swiss Alps near Davos.

Position 1: Plant Ecology, Davos. This project will examine how temperature, microclimate, snow conditions and competition affect the growth, demography and physiology of S. herbacea. The student will be supervised by Christian Rixen and Sonja Wipf (Davos, www.wsl.ch/fe/oekosystem/alpine) and Günter Hoch (Basel, pages.unibas.ch/botschoen/hoch).

Position 2: Evolutionary Ecology, Bern. This project will examine the heritability of plant traits, natural selection in different habitats, and the potential evolutionary responses of S. herbacea to climate change. It will also study the role of biotic interactions in constraining plant adaptation. The student will be supervised by Mark van Kleunen and Oliver Bossdorf (Bern, www.botany.unibe.ch/planteco).

Position 3: Ecological Genetics, Uppsala. This subproject will examine variation, selection and adaptation in S. herbacea at the molecular level. It will use population genomic approaches to study associations between molecular markers/candidate genes, ecologically important plant traits and habitat factors. The student will be supervised by Sophie Karrenberg (Uppsala, www.vaxtbio.uu.se/resfold/karrenberg.htm) and Christian Lexer (Fribourg, www.unifr.ch/biol/-ecology/lexer/).

For more information about the projects, research groups and places of work, please visit the websites, or contact the three subproject leaders, using the email addresses below.

All positions require a MSc degree (or equivalent), fluency in English, a driver?s licence, and the ability to work in an Alpine environment, sometimes independently and sometimes in a team. Previous experience with ecological field work/experiments and statistical skills are generally a plus. Position 3 requires experience with genetic lab work and analysis of genetic data. The durations of the positions are 3 years for PhD positions 1 & 2, and 4 years for PhD position 3.

Applicants should send a letter of application, explaining your motivation, research interests and relevant experience as well as a CV and contact details of at least two references, to rixen@slf.ch (position 1), vkleunen@ips.unibe.ch (position 2) or sophie.karrenberg@ebc.uu.se (position 3). The application deadline is 15 September 2010. Starting date for the positions will be January 1, 2011, or shortly thereafter.

Sophie Karrenberg Uppsala University Evolutionary Biology Center Plant Ecology Norbyvägen 18 D 752 36 UPPSALA Sweden

+46-(0)18-471 2863

sophie.karrenberg@ebc.uu.se

## ETH Zurich TropcialForestPopulationsGenetics

Fully funded PhD studentship offered in the Professorship of Ecosystem Management, ETH Zurich, Switzerland

Spatial Genetic Structure and Carbon Sequestration in Bornean Tropical Forests

Start Date: Jan 2011

Project: Tropical trees species are threatened by deforestation, which also accounts for an estimated 17% of global carbon emissions. Forest preservation can thus both conserve forest tree species and the carbon they contain. Effective conservation strategy requires an understanding of the processes underlying plant population viability, including reproduction, dispersal and genetic structure. There are indications that such processes correlate with wood density, providing the foundation by which carbon storage and population viability might be integrated within a single ecological framework.

This project seeks to quantify and evaluate the strength of relationships between wood density, reproductive traits, gene dispersal and spatial genetic structure of dipterocarp trees in Borneo, with a view to informing policy and management practice on forest restoration and carbon sequestration.

Specifically this project aims to:

1. Determine relationships between seed size, seed dispersal and wood density across a range of dipterocarp species.

2. Evaluate degree of spatial aggregation across tree size classes and correlate this to fruit traits (wing loading, seed size) and environmental variables (soil associations).

3. Conduct analyses of spatial genetic structure for 10 Shorea species with contrasting reproductive traits and wood density.

4. Evaluate the impact of changes in tree density due to forest fragmentation and degradation on genetic diversity along a wood density gradient.

This project will be conducted in close collaboration with the Sabah Forest Department and the Sepilok Forest Research Institute. The results of this work have application for tropical forest conservation, management and restoration across Southeast Asia.

Supervisors: Prof. Dr. Jaboury Ghazoul, Dr. Chris Kettle (ETH Zurich) and Dr David Burslem (University of Aberdeen).

Requirements: We are seeking highly motivated applicants, with a desire to work on Tropical Forest ecology as part of a dynamic team.

Essential requirements:

i. Good BSc and MSc degrees in Ecology, Evolutionary Biology, Population Genetics or other similarly relevant field.

ii. Very good spoken and written English.

Highly desirable:

i. Experience of working in tropical field conditions.

ii. Prior experience of molecular lab work.

iii. Quantitative and statistical expertise.

iv. Independence and self-reliance.

v. Spoken and written German.

Knowledge of spoken and written Malay would also be advantageous.

The Ecosystem Management Group is an international research group of scientists and students that addressed range of multi-disciplinary topics relating to conservation and ecosystem management in both temperate and tropical systems. More details can be found on our web site (www.ecology.ethz.ch). The group has access to world-class facilities (including the newly established Genetic Diversity Center Zurich).

Conditions of Employment: Three years appointment at ETH Zurich. Starting salary around 40,000 CHF per year. The successful candidate should expect to spend periods of fieldwork at Danum Valley, Sabah, Malaysian Borneo. The position is open to suitable candidates of all nationalities.

Application: Please send a letter of motivation, full CV and names and addresses of two academic referees to Ms. Ankara Chen by e-mail [chen(at)env.ethz.ch] by 1st Octoberth 2010. All applications must include "PSC application" in the subject line.

Informal enquires should be directed to Jaboury Ghazoul: [jaboury.ghazoul(at)env.ethz.ch].

Dr Chris Kettle

Ecosystem Management < http://-www.ecology.ethz.ch/people/pstdocs/people/pstdocs/-ckettle >

ETH Zurich

Switzerland

Kettle Chris <chris.kettle@env.ethz.ch>

## FIOCRUZ-Minas Brazil Genomics ComputBiol

Master and PhD positions at FIOCRUZ-Minas, Brazil, starting on February 2011

We are seeking a highly motivated candidate to engage a Master (24 months) or Ph.D. (48 months) graduate program at the Fundacao Oswaldo Cruz, FIOCRUZ (http://www.fiocruz) in Brazil, as part of the de Estudante-Convenio de Pos-graduacao (PEC-PG).

The selected candidate will joint the Genomics and Computational Group (http://bioinfo.cpqrr.fiocruz.br) and also interact with staff from the Center for Excellence in Bioinformatics (http://www.cebio.org), both at FIOCRUZ-Minas (http://www.cpqrr.fiocruz.br) in Belo Horizonte, Minas Gerais, Brazil.

This project aims at providing a better understanding of the biological diversity and evolution of human parasites, such as helminthes, and their vectors by adopting a phylogenomic framework. Besides contributing to the functional annotation of genomes and predicted proteomes, the selected candidate will conduct studies on the evolution of protein families in order to identify potential therapeutic targets against helminthoses through combined computational approaches.

Candidates with a Major or Masters degree in Biology, Physics or Computer Science are encouraged to apply. Prior experience with phylogenetic analysis, comparative genomics, and/or computational biology is desired. The selected candidate should have a strong interest in molecular and evolutionary biology and will be expected to work in a collaborative environment.

Important: Portuguese is the official language in all graduate programs in Brazil.

Eligibility / Requirements: Candidate should be a citizen of developing countries (see country list on websites below) and would preferably be employed in his/her home country. A certificate of proficiency in Portuguese (CELPE-Bras) is required for speakers of other languages when submitting an application to CNPq by October 4, 2010. Two-year home stay requirement after completion of the graduate program will apply. Further information on eligibility and requirements for full application can be found in the following websites:

Master's Program V CNPq, Brazil (other countries) http://www.cnpq.br/editais/ct/2010/pec_pg.htm Master's Program - CAPES (only for candidates from Timor Leste) http://www.capes.gov.br/cooperacao-internacional/multinacional/pec-pg Ph.D. Program V CAPES, Brazil http://www.capes.gov.br/cooperacao-internacional/multinacional/pec-pg Key Dates: September 1, 2010 V Submission of pre-application to FIOCRUZ-Minas October 4, 2010 V Submission of full application to CNPq December, 2010 V Announcement of awards by CNPq February, 2011 V Start date of graduate course in Brazil

For pre-application, please send a one-page letter of interest, grade transcript, and CV (up to three pages) to Laila Nahum (laila@nahum.com.br) by September 1, 2010.

Laila Alves Nahum, Ph.D. and Guilherme Correa de Oliveira, Ph.D. Fundacao Oswaldo Cruz, FIOCRUZ-Minas Centro de Pesquisas Rene Rachou, CPqRR Avenida Augusto de Lima, 1715 sala 504 30.190-002 Belo Horizonte, MG V BRAZIL

Laila Nahum <laila@nahum.com.br>

## GoetheU Frankfurt GenomicsVertebrateEvolution

The Biodiversity and Climate Research Centre (BiK-F) has been founded by the Senckenberg Gesellschaft fuer Naturforschung, the Goethe-University Frankfurt am Main, and additional partners. It is funded by the Federal State of Hesse through its Initiative for the Development of Scientific and Economic Excellence (LOEWE). The mission of the Centre is to carry out internationally outstanding research on the interactions of biodiversity and climate change at the organism level. The Project Area D "Laboratory centre" invites applications for the position of a

PhD position The Genomics of Vertebrate Evolution Project D1.2 [Ref. #D15] TV-H E 13 (50%)

The successful applicant will use bioinformatical methods for data mining of genome and transcriptome sequences for studying vertebrate evolution. The aim is to identify candidate genes that have been under selection during major past environmental changes. The candidate must hold a master or equivalent in bioinformatics, biology, genetics or a similar field of study. The applicant should have some background and strong interest in bioinformatics, population genetics and/or molecular phylogenetics. Programming (PERL, PYTHON or related) and some molecular biology skills are essential assets for the position. Good written and oral communication skills in English and the willingness to learn some German are required. Salary and benefits are according to a public service position in Germany (TV-H E 13, 50%). The Research Centre BiK-F advocates gender equality. Women are therefore strongly

encouraged to apply. Equally qualified severely handicapped applicants will be given preference. The contract shall start as soon as possible and will be restricted to three years. The duty station will be Frankfurt am Main, Germany. The employer is the Senckenberg Gesellschaft fuer Naturforschung. Please send your application by e-mail attachment, mentioning the reference of this position (#D15) and including a letter outlining your suitability for the post, a detailed CV, contact details of 2 referees and an electronic copy of your diploma-thesis and/or other exams before September 14th to: Prof. Dr. Dr. h.c. V. Mosbrugger, Scientific Coordinator Biodiversity and Climate Research Centre, Senckenberganlage 25, D-60325 Frankfurt am Main, Germany. Email to Service and Finances: recruiting@senckenberg.de. For scientific enquiries contact Prof. Dr. Axel Janke (ajanke@senckenberg.de).

Ursula Maurer <Ursula.Maurer@senckenberg.de>

## GoetheU Frankfurt PlantEffectorEvolution

The Biodiversity and Climate Research Centre (BiK-F) has recently been founded by the Senckenberg Gesellschaft fuer Naturforschung, the Goethe-University Frankfurt am Main, and additional partners. It is funded by the Federal State of Hesse through its Initiative for the Development of Scientific and Economic Excellence (LOEWE). The mission of the Centre is to carry out internationally outstanding research on the interactions of biodiversity and climate change at the organism level. The Project Area C “Adaptation and Climate” invites applications for the position of a

PhD position Effector evolution in plant pathogens Project C2.5 [Ref. #C39a]

The main subject of the advertised position will be the elucidation of evolutionary processes in the Hyaloperonospora arabidopsidis species cluster, with focus on the evolution of effector genes during adaptation and radiation of downy mildews. The project will involve population genetics, genomics, and functional analyses. The applicant should hold a diploma, masters or equivalent degree in biology, genetics, plant pathology, bioinformatics or a similar field of study. Experience in molecular biology (PCR, molecular cloning) is a prerequisite. Knowledge in population genetics, plant pathology or molecular phylogenetics is an advantage. Advanced English language skills and an interest in joining a multidisciplinary research team are required. Knowledge of German is an advantage, and at least the willingness to learn basic German is required. Salary and benefits are according to a public service position in Germany (TV-H E 13, 50%). The Research Centre BiK-F advocates gender equality. Women are therefore strongly encouraged to apply. Equally qualified severely handicapped applicants will be given preference. The contract shall begin as soon as possible and will be restricted to three years. The duty station will be Frankfurt am Main, Germany. The employer is the Senckenberg Gesellschaft fuer Naturforschung. Please send your application by e-mail, mentioning the reference of this position (#C39a) including a detailed CV, certificates, and 2 references, to: Prof. Dr. Dr. h.c. V. Mosbrugger, Scientific Coordinator Biodiversity and Climate Research Centre, Senckenberganlage 25, D- 60325 Frankfurt am Main, Germany. E-mail to Service and Finances: recruiting@senckenberg.de. Review of applications starts 20th of July 2010 and will continue until the position is filled. For enquiries about the position and the contract conditions please write to Prof. Dr. B. Stribrny (e-mail: bernhard.stribrny@senckenberg.de) and for scientific enquiries to Prof. Dr. M. Thines (e-mail: marco.thines@senckenberg.de).

Ursula Maurer <Ursula.Maurer@senckenberg.de>

## HelmholtzCentre Germany Phylogeography

Dear colleagues,

please take note of the this PhD position for an imminent German project analysing phylogenetic shifts of climate niches in mammals.

Best wishes, Marten Winter

For a project funded by the German Science Foundation (DFG), the UFZ Department of Computational Landscape Ecology at the Helmholtz Centre for environmental research (www.ufz.de) invites applications for 1 PhD position in the field of biogeography (m/f), code-digit 97/2010:

The project seeks to analyse the climatic niche of the worldâs mammals and then relate it to their phylogeny. Thereby the evolution of realised climate niches shall be reconstructed. The interested applicant should hold a master or diploma degree in Biology, Geoinformatics,

Geography or Physics with a leaning towards statistical computation (in R). The project comprises substantial amounts of statistical analysis and statistical and/or programming skills as well as basic knowledge of mammal ecology are of a strong advantage.

Working language will be English. The successful candidate will be working in a highly interdisciplinary research environment with excellent facilities and motivated colleagues.

For further information on the project please contact Dr. Carsten Dormann, carsten.dormann@ufz.de, phone +49 341 235-1946.

The position will be available starting from 1 October 2010, for 36 months. The place of work is Leipzig, Germany. Salary will be according to the appropriate civil service level TVÃD 13 (50%). Women are explicitly encouraged to apply in order to increase their share in science and research. Physically handicapped persons will be favoured if they are equally qualified.

The PhD students participate in the Graduate School HIGRADE (http://www.ufz.de/index.php?en=11429).

Interviews will start in September until the position is filled. Applications with a motivation letter, curriculum vitae and 3 references should be sent as single pdf-file by email to Dr. Carsten Dormann. In addition, send your complete application documents (CV, references, certificates) under code digits 97/2010 to the personnel department, P.O. box 500136, D-04318 Leipzig, Germany. E-Mail: application@ufz.de.

Dr. Marten Winter

Helmholtz Centre for Environmental Research â UFZ Department of Community Ecology

Helmholtz-Zentrum für Umweltforschung GmbH - UFZ Sektion Biozoenoseforschung Theodor-Lieser-Str. 4 D-06120 Halle (Saale) Germany

phone: ++49 (0) 345 558-5316 / fax:++49 (0) 345 558-5329 E-mail: Marten.Winter@ufz.de www.ufz.de/-index.php?enp81 DAISIE - Delivering Alien Invasive Species Inventories for Europe www.europe-aliens.org Marten Winter <marten.winter@ufz.de>

## LouisianaStateU EchinodermPhylogenetics

Anticipated MS/PhD student opportunity at Louisiana State University in 2011

A Research Assistantship is anticipated for the 2011-2012 academic year for a graduate student to work on molecular phylogenetics of echinoderms, with an emphasis on sea stars and brittle stars, under the direction of Dr. David W. Foltz, Dept. of Biological Sciences, Louisiana State University. Funding would be from a National Science Foundation Award titled "Assembling the Echinoderm Tree of Life."

Further details on this position plus instructions on how to apply can be found here:

www.biology.lsu.edu/webfac/dfoltz/lab/Position.htm Inquiries should be sent to this address:

David W. Foltz, Professor

Department of Biological Sciences

Louisiana State University

Baton Rouge, LA 70803

Ph: 225-578-1737

Fax: 225-578-2597

Email: dfoltz@lsu.edu

David W Foltz <dfoltz@lsu.edu>

## MasseyU FungalBioinformatics

PhD Project in Fungal Bioinformatics at Massey University, New Zealand

We are seeking an outstanding candidate for a PhD project in fungal bioinformatics. The successful applicant will be responsible for curating and analyzing next-generation transcriptome data to determine the consequences of hybridization on fungal gene expression.

The project is part of a collaboration between the Institutes of Natural Sciences (http://ins.massey.ac.nz) and Molecular BioSciences (http://imbs.massey.ac.nz) at Massey University, and AgResearch (http://-www.agresearch.co.nz), and is funded through the New Zealand Bio-Protection Research Centre (http://-/bioprotection.org.nz). The successful candidate will be based at the Institute of Natural Sciences at Massey University in Auckland, but will work closely with team members at the other two Institutes in Palmerston North.

This position would suit a highly-motivated student with a background in bioinformatics, computer programming, or mathematics. Training in biology is preferable, but not essential.

Requirements are: * Familarity with a Linux working environment * Experience with the analysis of next-generation sequencing technology reads * Programming experience

We are offering a fees-only scholarship for this PhD project. To support living costs during the course of their PhD study, candidates should apply for a Massey Doctoral Scholarship (see http://www.massey.ac.nz/massey/admission/-scholarships-bursaries-awards/doctorate-scholarships/-en/doctorate-scholarships_home.cfm for information).

For more information, please contact Dr. Austen Ganley at A.R.Ganley@massey.ac.nz

Austen Ganley (PhD) Senior Lecturer, Room 14.05 Institute of Natural Sciences Oteha Rohe Campus Massey University (Albany) Private Bag 102-904 North Shore Mail Center Auckland NEW ZEALAND

Phone +64-9-414-0800 ext.41512 Fax +64 9 441 8142

Mailing address: Building 11, INS Station Crescent Gate 4 Oteha Rohe Campus Massey University North Shore City NEW ZEALAND

A.R.Ganley@massey.ac.nz

## MaxPlanckInst Seewiesen EvolutionBatNeurogenesis

Masterthesis: Evolution of Adult Neurogenesis in the Olfactory Bulb of Bats Adult neurogenesis, i.e. the establishment of new neurons in the adult brain, is by no means a new phenomenon anymore, we still do not entirely understand its function and thus why it evolved in the first place.

Based previous work in bats (Amrein et al. 2007) we know that against expectations adult neurogenesis is practically absent in the hippocampus of bats, but there is always a large number of neuronal precursors observed in the sub-ventricular zone (SVZ) migrating through the rostral migratory stream to integrate in the granual cell layer of the main olfactory bulb (MOB). The MOB of mammals is the second known site of integration for neuronal precursor cells after the gyrus dentate in the hippocampus. Recent work on the role of olfaction in mammalian social and mating systems, has shown that odour cues have been important in the evolution of individual recognition, group cohesion, and also, mate choice. Knowing how flexible and dependent on environmental and physiological parameters adult neurogenesis is in the hippocampus, we want to investigate if there is similar flexibility in the brain centers involved with smell and whether this is connected with mate choice. If so, one would expect sexual dimorphism in the size of the relevant brains structures, but also in neurogenesis rates. In addition, one would expect seasonal variability, especially in the âodour-receivingâ sex in- and outside the mating season.

Our study species is Tadarida brasiliensis, the Mexican free-tailed bat. This species has sexually dimorphic odour-producing structures, offering an excellent opportunity for a pilot study looking at sexual and seasonal differences in neurogenesis rates in bats. Using the methods established in the lab of Manfred Gahr and Hans-Peter Lipp, we want to cryosection the brains obtained from our collaborators in the US and stain the sections for various markers of adult neurogenesis using immonohistological methodes. Afterwards stained sections have to be analyzed under the microscope counting immuno-positiv cells. A statistical analysis will tell us about possible biological relevance of the penomena observed.

Lab work will be done in Seewiesen (25 km south of Munich), at least 3 months of accomodation in the institute's guest house will be provided and the costs for the laboratory expenses will be covered. Unfortunately we cannot pay for food, travelling or any other expense.This is an excellent opportunity to get an inside view of a leading research institution and gather experience in a state-of-the-art laboratory methods.

Supervisors: Dr. Moritz Hertel, MPI Seewiesen (hertel@orn.mpg.de) und Dr. Dina Dechmann, Uni Konstanz und MPI Radolfzell (ddechmann@orn.mpg.de)

Starting date: as soon as possible Please contact Antje Weber (aweber@orn.mpg.de) for more information.

Dina Dechmann <ddechmann@orn.mpg.de>

## Montpellier MouseAdaptiveSpeciation 2

*Reminder: deadline is the 3d of September*

*Advert*

A PhD position is available at the Institut des Sciences de l'Evolution (Montpellier, France) to work with Guila Ganem on the causal and proximal mechanisms of adaptive speciation in the house mouse (Mus musculus). The project combines behavioural, biochemical, chemical and genetic approaches to understand the evolution of assortative mating based on an olfactory mate recognition system. Specifically, the PhD student will test for the role of competition and sexual selection in adaptive speciation, and will participate to the identification of the odorant molecules involved in species mate recognition. A strong background in evolutionary biology is required, experience in chemical ecology and behavioural ecology is not compulsory but will be appreciated. Candidates of all nationalities can apply, but they should be proficient in spoken and written English. French skills, although helpful, are not essential.

The PhD student will be immerged in a multidisciplinary international project. Furthermore, the Institut des Sciences de l'Evolution (http://www.isem.cnrs.fr/-) is hosted at the University of Montpellier, in the Mediterranean part of France and is part of a vast group of academic institutions in Montpellier devoted to research in Evolutionary Sciences, Ecology and Environmental Sciences and Applied Plant Sciences. Montpellier is more generally one of the most vibrant research communities in France.

The position is for three years. The student will be attached to the graduate school 'Ecole Doctorale SIBAGHE' (http://www.adum.fr/-as/ed/bsiae). Raw monthly salary is 2600 Euros. Deadline for submission of applications is the 3rd of September 2010. Interested candidates are strongly encouraged to make informal contact with Guila Ganem (guila.ganem@univ-montp2.fr <mailto:guila.ganem@univ-montp2.fr>). Applicants should send a 1-2-page application letter stating research interests and date of availability, a detailed CV, and the names and contact details of at least two referees, preferably by email.

Une bourse de thèse est disponible à l'Institut des Sciences de l'Evolution (Montpellier, France) pour travailler avec Guila Ganem sur les mécanismes causaux et proximaux de la spéciation adaptative chez la souris domestique (Mus musculus). Le projet intègre approches de génétique, d'écologie comportementale, d'écologie chimique et de biochimie dans le but de comprendre l'évolution de l'homogamie entre deux sous-espèces de souris, suspectée d'être liée à l'évolution d'un système de reconnaissance olfactif. En particulier, le/la doctorant(e) testera le rôle de la compétition et de la sélection sexuelle dans l'émergence de barrières reproductrices, et participera à l'identification des molécules odorantes impliquées dans cette reconnaissance spécifique. De bonnes connaissances de base en biologie évolutive sont nécessaires, et une expérience en écologie chimique / écologie comportementale n'est pas obligatoire mais serait appréciée. Les candidats de toutes nationalités peuvent postuler.

Le/la doctorant(e) sera immergé(e) dans un projet plus large, impliquant d'autres chercheurs basés à Montpellier et à l'étranger. Par ailleurs, l'Institut des Sciences de l'Evolution (http://www.isem.cnrs.fr/), situé sur le campus de l'Université Montpellier 2, fait partie d'un pole d'excellence regroupant diverses institutions qui développent des recherches en Sciences de l'Evolution, Ecologie, Sciences environnementales et Agronomie.

Le poste est pour trois ans. L'étudiant(e) sera rattaché(e) à l'Ecole doctorale SIBAGHE (http://-www.adum.fr/as/ed/bsiae). Le salaire brut mensuel sera de 2600 Euros.

La date limite de candidature est fixée au 3 Septembre 2010. Les candidats intéressés sont invités à prendre contact avec Guila Ganem (guila.ganem@univ-montp2.fr) . Les candidats devront envoyer, de préférence par email, une lettre de motivation (1-2 pages maximum) précisant leur date possible de démarrage, un CV détaillé et les noms et coordonnées d'au minimum deux personnes pouvant être contactées pour apporter leur avis sur le/la candidat(e).

Guila Ganem <guila.ganem@univ-montp2.fr>

## NorthCarolinaStateU PlantSystematicsEvolution

Ph.D. Student: Evolutionary developmental genetics of inflorescence architecture in Dogwoods - North Carolina State University

We are looking for a Ph.D. student to participate in a NSF-funded project investigating the genetic bases of inflorescence evolution in the dogwood family. The student will be working with a multidisciplinary team of three faculty members in the Department of Plant Biology and Department of Genetics at NCSU. Background and training in plant genetics, evolutionary development or molecular systematics is required. A MS degree and experiences in working with flowering plants in the interface of the three areas are preferred. Exper-

imental skills in plant genetic transformation, RNA in-situ hybridization, RT-PCR or qRT-PCR, and phylogenetics are desired. English skills in writing, speaking, and reading are expected.

The student will be supported by a combination of research funding and teaching assistantship. Women and other minority categories are encouraged to apply. Please send application by e-mail attachment to jenny_xiang@ncsu.edu including a letter outlining your suitability for the position, a detailed CV, and contact details of 3 referees. The position is available in the Spring 2011.

Jenny Xiang

Qiu-Yun (Jenny) Xiang, Ph.D. Associate Professor Department of Plant Biology North Carolina State University Gardner Hall 2115 Raleigh, NC 27695-7612 USA Phone: 919-515-2728 Fax: 919-515-3436 Homepage: http://www4.ncsu.edu/ ~ qyxiang Jenny Xiang <jenny_xiang@ncsu.edu>

## OregonStateU SheepPopulationStructure

Ph.D. Assistantship: population structure and the impact of climate change on desert bighorn sheep in national parks of the western United States.

Location: Oregon State University

Job Description: We seek outstanding applicants for a Ph.D. Assistantship to study genetic structure, genetic diversity, and impacts of climate change on desert bighorn sheep in 10 national parks in the western United States. The project is a collaboration involving Dr. Clinton Epps of Oregon State University (http://-/fw.oregonstate.edu/labs/epps/index.htm), Dr. Ryan Monello of the National Park Service (NPS), and researchers from other academic institutions, NPS, and other agencies. The student will lead the design and implementation of field sampling, genetic analyses, and spatially-explicit metapopulation models to determine how metapopulation structure and climate change affect persistence of desert bighorn sheep on park service lands.

Applicants should have a solid background in wildlife ecology, population genetics, landscape ecology, or a related field, demonstrated interest and ability in modeling, and the ability to work both independently and as a part of a research team. Students will be expected to present research results at professional conferences, publish research results in peer-reviewed scientific outlets, and pursue extramural funding to supplement their assistantships, as appropriate.

Applicants should create a single pdf that includes a letter of interest, a resume or CV, unofficial undergraduate and graduate transcripts, unofficial general GRE scores and percentiles (<5 years old), and a list of three references and their contact information (institution, email address, phone number). This pdf should be sent to Dr. Clinton Epps (clinton.epps@oregonstate.edu) via an email with Bighorn Assistantship in the subject line. The name of the pdf should contain the applicant's first and last names. Interested individuals with appropriate experience may contact me either by the email or phone (541-737-2478) before submitting materials.

Screening of applicants will begin immediately and continue through August 2010 (or until a suitable candidate is found), at which time desirable applicants will be invited to apply for admission to the graduate program in the Dept. of Fisheries and Wildlife, Oregon State University (http://fw.oregonstate.edu/).

Qualifications: Analytical techniques will likely include individual and population-based analyses of genetic structure and gene flow, GIS-based analyses of habitat, metapopulation structure, and outputs from downscaled climate change models, and spatially-explicit metapopulation modeling. Experience with GIS and quantitative population or metapopulation modeling, climate data and models, and/or population genetics is strongly preferred. Because some fieldwork will be required, experience working in remote landscapes is also helpful. Preference will be given to applicants with a research-based M.S. degree (or equivalent) in a relevant field and a publication record demonstrating ability to conduct, complete, and publish quantitative research.

Salary: This position provides three years of GRA funding at $1806/month plus a tuition waver, partial fee offset, and 85% of health insurance for the GRA (but not dependents). Additional support, if required, will be provided through graduate teaching assistantships. Start date: October 1, 2010 or January 1, 2011.

Clinton W. Epps Dept. of Fisheries and Wildlife, Oregon State University

Clinton.Epps@oregonstate.edu

## UAmsterdam PlantEvolutionaryGenomics

PhD Student in Plant Evolutionary Genomics at the University of Amsterdam, Netherlands

A PhD position is available for the project: "Ancient genome duplications and glucosinolate evolution in the Brassicales" funded by a Dutch NWO Ecogenomics grant. The project is collaborative between the University of Amsterdam, Netherlands (Eric Schranz), Radboud University Nijmegen, Netherlands (Nicole van Dam) and University of Missouri, Netherlands (Chris Pires).

Project description:

Understanding the role of ancient whole genome duplications (WGD) and subsequent pathway divergence in generating the complexity of life on earth is an important goal of comparative genomics. Recent genomic analyses have found that most flowering plant lineages have had one to several rounds of WGD in their history. These WGDs are believed to have contributed to plant evolutionary innovations and success. However, there are few examples of how key innovations derive from duplicated pathways.

This project will investigate the potential link between WGDs and key-trait evolution by investigating the glucosinolate defense pathway in the plant order Brassicales. The Brassicales is an excellent plant genomics research system with 16+ genome sequencing projects completed or underway (including Arabidopsis, Brassica crops and papaya) and the glucosinolate pathway is one of the best-characterized plant defense systems with great structural diversity and biological activity linked to variable amino acid precursors. In this project you will utilize twelve diverse species for: (1) making a survey of glucosinolates, their induction and other correlated metabolites; (2) cloning and/or bioinformatic mining of key candidate genes; (3) studying gene expression patterns; (4) making detailed phylogenetic and molecular evolutionary analyses; and (5) integrating results by systems biology analysis of pathway duplication and divergence.

Applying:

We are seeking a highly motivated and independent student that has completed their Bachelor or Master Program. You should be familiar with molecular techniques and have good interpersonal and communication skills. Amsterdam is a wonderful city to live and work in. We have recently moved into a new Faculty of Science building with excellent laboratory and plant growth facilities.

The position will begin January 1, 2011. Applicants should send a letter of application explaining your motivation, research interests and relevant experience as well as a CV and contact details of at least two references. Please apply by September 20th.

To apply, or for more information, please contact:

Dr. Eric Schranz, e-mail: M.E.Schranz@uva.nl; tel: +31 20-525 7660;

Eric Schranz University of Amsterdam Institute for Biodiversity and Ecosystem Dynamics (IBED) Faculty of Science PO Box 94240, 1090 GE Amsterdam, The Netherlands

Email: M.E.Schranz@uva.nl Tel: +31 (0)20 525 7660 Fax: +31 (0)20 525 7832 http://home.medewerker.uva.nl/m.e.schranz/ M.E.Schranz@uva.nl

## UExeter EvolutionInformationProcessing

Phd position at the OSS Lab, University of Exeter for an international student

Information processing at cellular level and its evolution. The aim of this project is to better understand the relation between response dynamics and features of protein networks. By developing generic models based on first-principles and existing biological knowledge (see for example [Csikász-Nagy, A., Cardelli, L. & Soyer, O. S. J R Soc Interface (2010)], we will analyze the repertoire of response dynamics in protein networks and effectively map out their information processing capabilities. Further, such models will allow us to analyze how different evolutionary processes can shape key network features and generate novel information processing capabilities [Soyer, O. S. Sci Signal 3, pe23 (2010)].

For this PhD project, the OSS lab (http://-people.exeter.ac.uk/oss203/) recently received a Dorothy Hodgkin Postgraduate Award from EPSRC and Microsoft Research. This prestigious award will allow a successful candidate to undertake cutting-edge research under the supervision of

Orkun Soyer (head of OSS lab, University of Exeter) and Luca Cardelli (Microsoft Research, Cambridge, UK) with a generous stipend and budget for conference attendance. Further, the candidate will be able to participate at Microsoft Research summer schools (http://research.microsoft.com/en-us/events/-2010summerschool/).

Skills and Eligibility: The Dorothy Hodgkin Postgraduate Award (DHPA) (http://www.rcuk.ac.uk/hodgkin/-default.htm) is available only to student nationals from India, China, Hong Kong, South Africa, Brazil, Russia and the developing world, as defined by OECD (http:/-/www.oecd.org/dataoecd/62/48/41655745.pdf). The candidate needs to demonstrate sufficient English proficiency (e.g. an overall TOEFL score of 79 with no less that 17 for writing and no less than 20 for reading and listening). GRE general test is not required but beneficial. If the candidate has recent GRE scores, these should be included with the covering letter. The candidate should have an undergraduate degree (equivalent of class 2.1 or better for UK) with either a mathematical or a biochemical focus. A good grasp of biochemistry of signaling networks and molecular evolution, agent-based modeling, and system dynamics analyses (e.g. bifurcation analysis) would be beneficial but is not necessary.

Exeter: University of Exeter is well positioned among the leading research-intensive universities in the UK. The University is undergoing a strategic development with continuing investment in excess of £40 million. Within this development, Systems Biology is recognised as a growth area and there are now several leading research groups at Exeter focusing on both experimental and theoretical systems biology. Exeter offers excellent student living and the University is ranked number one in the UK for student satisfaction. Exeter is situated in the south-west of England which is considered the most beatiful part of the country and a hub for outdoor activities such as hiking, surfing and sailing.

Application Details: Application deadline is 24th of September. To apply, fill in the online application from at http://www.exeter.ac.uk/postgraduate/-money/2010studentships/application/and include a CV and covering letter detailing your motivation for undertaking a PhD.

Informal queries should be sent to: Orkun S. Soyer at O.S.Soyer@exeter.ac.uk

"Soyer, Orkun" <O.S.Soyer@exeter.ac.uk>

## UHelsinki AntGenomics

PhD position: Genomic consequences of low relatedness in ant societies University of Helsinki, Department of Biosciences

The differentiation into queen and worker castes is the foundation of advanced insect sociality, and is based on differences in gene expression between the castes. Caste specific expression also affects how natural selection works on the genes. Because workers do not reproduce themselves, selection on genes expressed in workers depends on the relatedness between workers and the queens they help. In ants, relatedness between queens and workers varies widely, but little is known about how this affects the evolution of gene expression across species.

In order to study these questions, the project "Genomic consequences of low relatedness in ant societies", funded by the Academy of Finland and carried out at the University of Helsinki, Finland, is looking for a highly motivated PhD student. The ideal candidate has an MSc in biological sciences, with experience of molecular genetics lab work (preferably gene expression analyses), ability and desire to acquire new skills, enthusiasm for research in genetics and evolution, and an ability to work independently as well as in a team.

The Phd student is expected to carry out gene expression analyses using real time qPCR on a number of genes, and analyse the results in a comparative framework. The main focus will be on comparing gene expression patterns in unicolonial ants (such as the Argentine ant and unicolonial /Formica/ wood ants) that have extremely low relatedness societies with their non-unicolonial relatives. In addition to this main focus, the project can be expanded to include other directions, depending on the skills and interests of the student and the progress of the project.

The position is funded for four years, with a salary according to the University of Helsinki salary system (ca. 2000 euro per month). The PhD project can be started in the beginning of 2011.

The PhD thesis will be supervised by Dr. Heikki Helanterä and Prof. Pekka Pamilo, and carried out in close collaboration with The Centre for Social Evolution at the University of Copenhagen (Prof. Jacobus J. (Koos) Boomsma, Dr. Jes S. Pedersen, Dr. Morten

Schiøtt). The research group of Dr. Heikki Helanterä is part of the group studying social evolution in ants at the Department of Biosciences at the University of Helsinki (Prof. Lotta Sundström, Prof. Pekka Pamilo, Dr. Perttu Seppä and others).

Send your application to heikki.helantera@helsinki.fi <mailto:heikki.helantera@helsinki.fi>. Attach a CV, publication record, contact details of two references, and a two page (max) description of your research interests and why you would be a suitable candidate for the project. Screening of the applications will start on 1ˆst of October.

More info: heikki.helantera@helsinki.fi <mailto:heikki.helantera@helsinki.fi> http://-www.helsinki.fi/science/ants/Heikki.htm http://-www.helsinki.fi/science/ants/ Heikki Helanterä, PhD, Academy of Finland Research Fellow

Department of Biosciences University of Helsinki POB 65 / Viikinkaari 1 FI-00014 Univ. of Helsinki Finland

e-mail: heikki.helantera@helsinki.fi website: http://-www.helsinki.fi/science/ants/Heikki.htm phone: +358-9-19157682

## UIdaho 12 EvolBiol

We are recruiting 12 PhD students to work in interdisciplinary teams focused on the social and ecological resilience of ecosystems in Idaho and Costa Rica with funding from the NSF IGERT program.

Prospective doctoral students with experience in the following subject areas are needed:

entomology soil science agricultural ecology restoration plant ecology forest resources forest ecology landscape ecology and genetics plant virus ecology invasive species ecology conservation social sciences rural sociology environmental sociology rural and community economics resource economics hydrology and watershed management wildlife biology and genetics

Requirements: Applicants must be American citizens or permanent residents of the USA. Successful applicants must have obtained a research-based M.S. degree in a discipline of relevance to the project or equivalent experience during or after a B.S. degree, and demonstrate interest and/or experience in team-based projects. Students will join the program to begin course work at the end of July 2011.

Review of applications will begin November 1st 2010. Earlier applications are highly encouraged. Interviews of top applicants will be conducted at the University of Idaho campus in early February 2011.

For specific details on the research focus of each team/project and application information visit our web site: http://www.cals.uidaho.edu/igert2/

Lisette

– Lisette Waits, PHD Professor Fish and Wildlife Resources Center for Research on Invasive Species and Small Populations Laboratory for Conservation and Ecological Genetics University of Idaho PO Box 441136 Moscow, ID 83844-1136 Phone: (208) 885 7823 Fax: (208) 885 9080 lwaits@uidaho.edu http://www.cnrhome.uidaho.edu/-default.aspx?pid=72862 http://www.cnr.uidaho.edu/-crissp http://www.cnr.uidaho.edu/lecg/ http://-/www.cals.uidaho.edu/igert2/ Lisette Waits <lwaits@uidaho.edu>

## UIllinois SorghumEvolution

A PhD position is available at the Energy Biosciences Institute at the University of Illinois to study the evolution of developmental and life history traits in sorghum using linkage and association mapping. Traits of interest include flowering phenology, carbon allocation, perenniality, and plant architecture.

The Energy Biosciences Institute (EBI; www.energybiosciencesinstitute.org) is a multidisciplinary group of over 60 research programs and projects at the University of Illinois and the University of California, Berkeley, devoted to finding biological solutions to global energy challenges, and funded by a 10-year, $500 million grant from the energy company BP. At the University of Illinois, EBI is housed in the Institute for Genomic Biology (IGB; www.igb.illinois.edu), one of the newest buildings on campus, and offers a large, fully-equipped lab space and ample computational infrastructure. Champaign-Urbana is located in east-central Illinois, several hours drive from Chicago, St. Louis, and Indianapolis, with a thriving arts scene, affordable housing, and a family-friendly community.

To apply, please email a CV and statement of research interests to:

Dr. Patrick Brown Assistant Professor Energy Bio-

sciences Institute & Department of Crop Sciences University of Illinois 1408 Institute for Genomic Biology

pjb34@illinois.edu

## UJyvaskyla Finland ComparativeTranscriptomics

EU funded Early Stage Researcher position in comparative transcriptomics: Jyvaskyla, Finland

A position is available for an early stage researcher (MSc or equivalent) in the lab of Emily Knott at the University of Jyvaskyla, Finland within the EU Marie Curie Initial Training Network Speciation. Funding for 15 months is available. Extension of the project and employment for a full PhD studentship is possible. The project involves a comparative transcriptomic study of the developmentally polymorphic polychaete Pygospio elegans.

Applications are due on 1 September 2010 and should include a CV and brief motivation letter. Applicants must meet the eligibility requirements as outlined in the FP7 Work Programme âPeople.â The position should begin as soon as possible, at latest, 1 January 2011.

For more information, please contact Emily Knott emily.knott@jyu.fi And see the labâs web pages: https://www.jyu.fi/bioenv/en/divisions/-eko/research/Knott_group Information about the ITN Speciation can be found here: http://-speciation.group.shef.ac.uk/ Information about the University of Jyvaskylaâs Department of Biological & Environmental Science can be found here: https://www.jyu.fi/bioenv/en

Dr. K. Emily Knott Department of Biological & Environmental Sciences P.O. Box 35, Survontie 9, Ambiotica C410.2 40014 University of Jyväskylä FINLAND

tel: 358 14 260-2302 fax: 358 14 260-2321 https:/-/www.jyu.fi/bioenv/en/divisions/eko/research/-Knott_group/index.html http://users.jyu.fi/˜kknott/-index.html emily.knott@bytl.jyu.fi

## UManchester Ecology of Social Evolution

A PhD position in The Ecology of Social Evolution in Dictyostelium discoideum at the University of Manchester

A PhD studentship is available at the University of Manchester to examine the effect of ecological factors and life-history trade-offs on social success and cheating in Dictyostelium discoideum. The project integrates concepts from ecology, social evolution and life- history evolution with a developmental genetics perspective. It provides opportunities for students to develop both theoretical and empirical/experimental skills (though the project is strongly experimentally driven).

D. discoideum is an excellent model system to examine the genetic basis of cooperation and cheating because free living individuals aggregate to make a multicellular 'organism' (the 'slug') that goes through development to form a dead stalk that holds aloft a spore-head. Because different genotypes will aggregate to form chimeric slugs, competition for space in the spore-head should lead to strong selection to become viable spores rather than dead stalk cells. The aim of this studentship is to ask how natural variation in social success is maintained and how cheater spread is mitigated in D. discoideum in the face of this strong selection.

The project will be jointly supervised by Daniel Rozen and Chris Thompson in new state of the art laboratory facilities in the Faculty of Life Sciences (University of Manchester). The student will benefit from exposure to and training in a wide variety of different techniques, ranging from quantitative data handling, theoretical population genetics, experimental evolution and statistical analysis to genetics and molecular cell biology. Importantly, you will also work closely with Jason Wolf at the University of Bath, where additional mathematical, theoretical or data analysis training needs will be met.

The studentship would begin at either the September 2010 or January 2011 intake dates.

For application details and further information, please see http://tinyurl.com/32odjg5 (the advertisement on findaphd.com).

Please address informal inquiries to:

Chris Thompson (Christopher.thompson@manchester.ac.uk)

Daniel Rozen (Daniel.rozen@manchester.ac.uk)

Jason Wolf (Jason@evolutionarygenetics.org)

Daniel Rozen Faculty of Life Sciences Michael Smith Building Oxford Road, Manchester M13 9PT UK

phone: +44 (0)161 275 5094 fax: +44 (0)161 275 5082

Daniel.Rozen@manchester.ac.uk

## UWindsor EvolutionaryGenomics

University of Windsor; Ecological Genomics

One Ph.D. position beginning January 2011 or September 2011 is available in the lab of Dr. Melania Cristescu at the University of Windsor, the Great Lakes Institute for Environmental Research. Research in our lab combines evolutionary biology with molecular genetics and genomics to address broad evolutionary questions. We use lab experiments, field studies and computational analyses of large scale sequence data to test speciation patterns, the genetics of habitat transitions and local adaptation in aquatic invertebrates. See our web page at http://www.uwindsor.ca/glier/mcris/ for a description of current research projects.

We are looking for a highly motivated graduate student to help develop and work on a project about the genetics of habitat transitions in Daphnia. Candidates should have a strong undergraduate background in biology, with course work in molecular genetics and evolution. Prior molecular or computational research experience with any organism is required. Successful applicants must have obtained a research-based M.S. degree in a discipline of relevance to the project, and demonstrate interest and/or experience in team-based and interdisciplinary projects. International students with strong credentials and publication record are also considered.

For more information and inquiries about the position please contact Melania Cristescu at mcris@uwindsor.ca

Melania E. Cristescu Assistant Professor University of Windsor Great Lakes Institute for Environmental Research 401 Sunset Ave Windsor Ontario Canada N9B 3P4

Phone: (519) 253-3000 Ext. 3763 FAX: (519) 971-3616 E-Mail: mcris@uwindsor.ca http://-uwindsor.ca/glier/melania-cristescu Melania Cristescu <mcris@uwindsor.ca>

# Jobs

## ArizonaStateU Bioinformatics Programmer

The Center for Evolutionary Medicine and Informatics (CEMI) at the Biodesign Institute is seeking a Computer Programmer Assistant to be responsible for the maintenance, development, and debugging of software applications for use in the fields of Computational Biology and Bioinformatics (URL: http://kumarlab.biodesign.asu.edu). We have already developed many tools, including MEGA (http://www.megasoftware.net), TimeTree (http://www.timetree.org), and FlyExpress (http://-www.flyexpress.net). Come join an active and dynamic team.

Desired Qualifications: Experience working with one or more major programming languages such as Java, Delphi, or C++/C#; design/development of rich internet applications; problem solving skills; bioinformatics.

MORE INFORMATION: The scientific programs in CEMI address four primary research themes. 1) personal genomics: predicting adaptive and disease propensities of mutations in individuals; 2) disease origins: tracing pathogen evolution to unravel dynamics of infections and drug resistance; 3) functional proteomics: discovering functionally important elements of genome; and 4) discovery bioinformatics: modeling, analysis, and simulations to discover patterns and test predictions. More information about the Center can be found at http://cemi.asu.edu . You can view and apply for this job at: https://ep.oasis.asu.edu/-psp/asuepprd/EMPLOYEE/PSFT_ASUSAPRD/-c/HRS_HRAM.HRS_CE.GBL?Page=-HRS_CE_JOB_DTL&Action=A&JobOpeningId=-24958&SiteId=1&PostingSeq=1 (JOB ID: 24958; ASU, Tempe Campus) Initial deadline: September 1, 2010 (with weekly review thereafter)

Sudhir Kumar, Director Center for Evolutionary Medicine & Informatics Biodesign Institute (office A-240) Professor, School of Life Sciences Arizona State University Tempe, Arizona, AZ 85287-5301, USA

s.kumar@asu.edu

## BardCollege ResAssist TickEvolution

The Biology Program at Bard College is seeking a highly motivated individual with molecular biology laboratory experience for a full-time Research Assistant position. The successful candidate will be joining a multidisciplinary group studying environmental factors affecting transmission of emerging tick-borne infectious diseases. Duties include high throughput screening of ticks for the presence of pathogens using real-time and nested PCR, ordering of supplies, and management of a large database.

The successful candidate will have a minimum of a bachelor's degree in biology or a related discipline and extensive experience with PCR, be capable of working independently, have exceptional organizational skills and meticulous work habits in the laboratory, and enjoy working as an integral part of a diverse team of scientists and public health professionals. Bard College is an equal opportunity employer and welcomes applications from individuals who contribute to its diversity. Please send cover letter with resume and list of three references to Human Resources-7708, Bard College, PO Box 5000, Annandale-On-Hudson, NY 12504-5000, fax to 845-758-7826 or email to hr@bard.edu <mailto:hr@bard.edu> (Word attachments only). Review of applicants will begin immediately. AA/EOE

Felicia Keesing Associate Professor of Biology Bard College

Felicia Keesing <keesing@bard.edu>

## BEACON MichiganStateU EvolutionEducationDirector

Education Director – BEACON Center for the Study of Evolution in Action

The BEACON Center for the Study of Evolution in Action is a newly established NSF Science and Technology Center (STC), funded at $5 million/year for five years, renewable to ten years. We are recruiting a full-time Education Director who is an accomplished scholar, with a deep understanding of evolution, some knowledge of computation, and a commitment to innovative science education at all levels. Desirable qualifications include a record of administrative leadership and exceptional interpersonal, communication and multi-tasking skills. This is a fixed term position at Michigan State University. The initial appointment is for 12 months, with annual reappointment possible for the duration of the project. Salary and benefits will be competitive, commensurate with experience.

BEACON will advance research and education on the evolutionary dynamics of natural and digital systems and apply new evolutionary principles to engineering and biological problems. BEACON includes over 60 faculty members in biology, engineering and computer science, half at Michigan State University (BEACON headquarters), with others distributed among North Carolina A&T State University, University of Idaho, University of Texas at Austin, and University of Washington. Additional information is available at the BEACON website: http://www.beacon.msu.edu/ . The Education Director is a member of the BEACON management team, reporting to the BEACON Director. She or he is a member of the Education and Human Resource Development (EHRD) Steering Committee and works with that committee to initiate and facilitate projects within the educational mission of BEACON, including mentoring postdocs, multidisciplinary graduate training, undergraduate research and education, K-12 and public outreach. The Education Director coordinates educational initiatives among the five BEACON universities as appropriate and works with the leadership and evaluation teams to prepare materials related to EHRD activities to be submitted in BEACON reports. She or he works with BEACON faculty in the preparation of proposals for external support of BEACON EHRD activities and on scholarly publications that follow from these activities. The Education Director will have the opportunity to devote up to 25% of her or his effort to collaborative studies that advance the BEACON research and/or education missions.

Questions and applications should be emailed to Tom Getty, Chair of the BEACON Education Director Search Committee, at getty@msu.edu with "BEACON Education Director" in the subject line. Applications should include a cover letter, a full resume/vita, a two-page statement of purpose emphasizing the applicant's suitability for the job, and contact information for three references. Application materials should be emailed as a single pdf-file, if possible. We will begin reviewing applications on August 15, 2010 and continue the search until the position is filled.

MSU is an affirmative-action, equal-opportunity employer. MSU is committed to achieving excellence through cultural diversity. The university actively encourages applications and/or nominations of women, persons of color, veterans and persons with disabilities.

Connie James

Connie James <jamesc@msu.edu>

## BrighamYoungU ComputationalBiology

Computational Biology Position Announcement The Department of Biology at Brigham Young University (BYU) invites applications for a continuing faculty status (BYU's equivalent to tenure) track position in the area of computational biology. We seek exceptional individuals with a PhD and postdoctoral experience relevant to computational biology, including degrees in areas of biology, computer science, mathematics, and/or statistics. The successful candidate is expected to develop an externally funded research program and teach courses in computational biology and the biology core. The department offers competitive start-up packages and reduced teaching loads for new faculty. The anticipated start date for this position is January or August 2011.

Complete applications will include a cover letter, curriculum vitae, teaching statement, research statement, and a completed BYU employment application form (found at https://yjobs.byu.edu). Applicants should provide names and contact information for three references; letters of recommendation will be requested for those candidates that make our short list. The initial review process will begin September 30, 2010 and continue until the position is filled. Inquiries should be directed to Dr. John S.K. Kauwe, Computational Biology Faculty Search, 401 WIDB, Department of Biology, BYU, Provo, UT 84602, USA (or email bio@byu.edu<mailto:bio@byu.edu>).

Brigham Young University, an equal opportunity employer, does not discriminate on the basis of race, color, gender, age, national origin, veteran status, or against qualified individuals with disabilities. All faculty are

required to abide by the university's honor code and dress and grooming standards. Preference is given to qualified candidates who are members in good standing of the affiliated church, The Church of Jesus Christ of Latter-day Saints. Successful candidates are expected to support and contribute to the academic and religious missions of the university within the context of the principles and doctrine of the affiliated church.

Byron Adams Evolutionary Ecology Laboratories, Department of Biology Brigham Young University Provo, UT 84602

byron_adams@byu.edu

## BroadInstitute CompBiol ViralGenomics

Dear EvolDir Members,

The Broad Institute is currently seeking qualified candidates for a computational biologist position within the viral genomics group. For more information about this position and to apply please visit:

http://www.broadinstitute.org/careers/career-center and search for requisition #329.

Best, Matt

Matthew Henn, Ph.D. Director Viral Genomics Broad Institute of MIT & Harvard

mhenn@broadinstitute.com

## CaliforniaAcademySciences EvolutionFish

EVOLUTION, DIVERSITY, AND CONSERVATION OF FISHES California Academy of Sciences, San Francisco

The California Academy of Sciences seeks an outstanding scientist to conduct innovative, externally funded research in the phylogeny, diversity, and conservation of fishes. We are particularly interested in individuals conducting rigorous field and laboratory-based analyses of key questions in evolution and conservation science, using molecular, morphological, developmental, and biodiversity informatics approaches in the context of phylogeny and global environmental change. Candidates should have a strong commitment to the curation, use and development of museum collections as a complement to their research and to participation in the Academy's public engagement programs. Relationships with local universities provide opportunities to participate in graduate and undergraduate teaching and training. Hires may be made at any level.

Applicants should submit a curriculum vitae, statement of research goals, up to three publications, and contact information for three references by 15 October 2010 to casvert@calacademy.org. The California Academy of Sciences is an equal opportunity employer and welcomes applications from individuals who will contribute to its diversity.

DRobson@calacademy.org

## CaliforniaAcademySciences EvolutionReptilesAmphibians

EVOLUTION, DIVERSITY, AND CONSERVATION OF REPTILES & AMPHIBIANS California Academy of Sciences, San Francisco

The California Academy of Sciences seeks an outstanding scientist to conduct innovative, externally funded research in the phylogeny, diversity, and conservation of amphibians and reptiles. We are particularly interested in individuals conducting rigorous field and laboratory-based analyses of key questions in evolution and conservation science, using molecular, morphological, developmental, and biodiversity informatics approaches in the context of phylogeny and global environmental change. Candidates should have a strong commitment to the curation, use and development of museum collections as a complement to their research and to participation in the Academy's public engagement programs. Relationships with local universities provide opportunities to participate in graduate and undergraduate teaching and training. Hires may be made at any level.

Applicants should submit a curriculum vitae, statement of research goals, up to three publications, and contact information for three references by 15 October 2010 to casvert@calacademy.org. The California Academy of Sciences is an equal opportunity employer and welcomes applications from individuals who will contribute

to its diversity.

DRobson@calacademy.org

## CaliforniaAcademySciences MicroorganismEvolution

MICROORGANISMS: PHYLOGENETIC, TAXONOMIC AND FUNCTIONAL DIVERSITY California Academy of Sciences, San Francisco

The California Academy of Sciences seeks an outstanding scientist to conduct innovative, externally funded research in the phylogenetic, taxonomic and functional diversity of microorganisms. Microorganisms are broadly construed to include Archaea, Bacteria, viruses or microscopic Eukarya. We are interested in individuals conducting field, laboratory and/or informatics based analyses to discover and understand poorly known microorganisms in the context of phylogeny, ecosystems function and global environmental change. Candidates should have a strong commitment to participation in the Academy's public engagement programs. Hires may be made at any level.

Applicants should submit a curriculum vitae, statement of research goals, up to three publications, and contact information for three references by 15 October 2010 to casmicro@calacademy.org.

The California Academy of Sciences is an equal opportunity employer and welcomes applications from individuals who will contribute to its diversity.

DRobson@calacademy.org

## CollegeHolyCross EvolutionaryVertebrateBiol

Evolutionary Vertebrate Biologist

The Department of Biology of the College of the Holy Cross seeks an organismal biologist with expertise in vertebrates for appointment as a tenure-track assistant professor beginning August 2011. Candidates must demonstrate commitment to, and excellence in, undergraduate teaching as well as scholarly achievement, and propose a research program involving undergraduates. A Ph.D. is required at the time of appointment and post-doctoral experience is desirable.

This position carries a 3-2 teaching load with a full-salary one-semester leave prior to tenure review and generous sabbatical and fellowship leaves for senior faculty. The appointee will be expected to develop an intermediate lab/field course on the evolutionary biology of vertebrates or a vertebrate group, to develop a one-year human comparative anatomy and physiology course targeted for non-premed pre-health students, and to participate in other teaching in the department.

Applicants should submit a cover letter, statements describing research interests and teaching philosophy, curriculum vitae, official academic transcripts, publications, and three letters of recommendation in hard copy by 15 October 2010 to Dr. Rob Bellin, Search Committee (Ref. E), Department of Biology, College of the Holy Cross, Worcester MA 01610.

For detailed information on the position and application procedure, please see the Biology Departments website: http://academics.holycross.edu/biology . The College of the Holy Cross (enrollment 2,700) is a highly selective Catholic liberal arts college in the Jesuit tradition located in a medium-sized city 45 miles west of Boston. Holy Cross belongs to the Colleges of Worcester Consortium (http://www.cowc.org) and the New England Higher Education Recruitment Consortium (http://www.newenglandherc.org/home/-index.cfm). The College is an Equal Employment Opportunity Employer and complies with all Federal and Massachusetts laws concerning equal opportunity and affirmative action in the workplace.

Robert M. Bellin, Ph.D. Associate Professor Department of Biology 331 O'Neil Hall College of the Holy Cross Worcester, MA 01610

Phone: 508-793-3422 Fax: 508-793-2696 e-mail: rbellin@holycross.edu

rbellin <rbellin@holycross.edu>

## CornellU ComputationalBiology

Faculty position in computational biology and bioinformatics at Cornell University

Assistant, Associate or Full Professor Applications are invited for a tenure-track position in Computational Biology in Cornell University's Computer Science Depart-

ment. The position could be at the assistant, associate, or full professor level, depending on experience. Applicants must possess a Ph.D. in computer science, or a Ph.D. in a related field and sufficient expertise in computer science to fit within a CS department. Faculty in this position will also have the opportunity to interact closely with campus-wide biology efforts, including the Cornell Center for Comparative and Population Genomics.

Outstanding applicants in all areas of computational biology will be considered, but research areas of special interest include evolutionary, comparative, and population genomics; applications of new high- throughput genomic or proteomic technologies; dynamical behavior at the sub- cellular and cellular levels; networks in biological systems; and applications of machine learning to biological problems.

To ensure full consideration, applications should be received by December 1, 2010, but they will be accepted until the position is filled. Applicants should submit a curriculum vitae and a research statement and should arrange to have three reference letters submitted, at http://www.cs.cornell.edu/apply. Cornell University is an equal opportunity employer and welcomes applications from women and ethnic minorities.

Adam Siepel <acs4@cornell.edu>

## DrexelU EvolutionaryBiol

The Department of Biology at Drexel University (www.drexel.edu/biology) invites applications for an anticipated tenure-track faculty position in the fields of Ecology, Evolution, and Environmental Biology. Applications at level of associate or full professor rank are encouraged. The Biology department will move to the Papadakis Integrated Sciences Building in July 2011 (www.drexel.edu/biology/news_ISB.html). Drexel has committed substantial resources for the departments growth over the next five years. Candidates with funded research programs who can synergize existing interests in the department will be given the highest priority. We are particularly interested in individuals addressing research questions related to: climate change; plant, terrestrial, or landscape ecology; environmental microbiology; evolution; paleobotany; or biodiversity.

The department is located on Drexels main campus in the University City area of Philadelphia, where several academic institutions are concentrated in a rich and historic urban environment. Anticipated start date for the position is Sept. 2011. Applicants should have a PhD or DPhil. Apply online at www.drexeljobs.com/-applicants/Central?quickFinds973; please attach CV, two-page statement of research interests & goals, one-page statement on teaching philosophy & experience, and contact information for three references. Application deadline is November 30, 2010.

For additional information about the Department of Biology's hiring process, please contact the

Biology Search Committee, Dept. of Biology, Drexel University, 3141 Chestnut St., Philadelphia, PA 19104 (biology.search@drexel.edu). Drexel University is an Equal Opportunity/Affirmative Action Employer and encourages applications from women, members of minority groups, disabled individuals, and veterans.

Jacob Russell <jar337@drexel.edu>

## DuquesneU EukaryoticBiologist

Duquesne University invites applications for a tenure-track position in the Department of Biological Sciences.

The successful applicant is expected to develop a vigorous independent research program involving the study of molecular, cellular, and/or organismal processes in eukaryotes. Areas of interest include, but are not limited to, molecular biology, cell biology, development, immunology, and physiology. The successful candidate will join an active department of 18 faculty with a commitment to combining externally funded research with excellence in teaching at both the graduate and undergraduate levels. Applicants must have post- doctoral experience, and are expected to mentor MS and PhD students. Preference will be given to candidates at the Assistant Professor level. However, more senior candidates may also be considered. Competitive salary and start-up packages are available. Additional information about the Department can be found at http:/-/www.duq.edu/biology . To apply, send a cover letter, CV, statements of research and teaching goals, and three letters of recommendation to Chair, Biology Faculty Search Committee, Department of Biological Sciences, 201 Mellon Hall, 600 Forbes Avenue, Pittsburgh, PA 15282. Review of applications will begin October 15, 2010. Please direct inquiries about the position to biology@duq.edu. Motivated by its Catholic identity, Duquesne values equality of opportunity both as an educational institution and as an employer.

Michael Jensen-Seaman, PhD Department of Biological Sciences Duquesne University

seamanm@duq.edu

## Dusseldorf EvolutionaryGenetics

The newly founded research group of Population and Quantitative Genetics at Heinrich-Heine Universität in Düsseldorf, Germany has two open positions, available immediately, for a

1. SENIOR POSTDOC / GROUP LEADER

and

2. PhD STUDENT

The group of Dr. Laura Rose focuses on population genetics of plants and coevolution between plants and microbes. The three major projects in the group are wild tomatoes and bacterial pathogens, Arabidopsis and oomycete pathogens, and Lotus species and rhizobia.

We are looking for enthusiastic, dedicated scientists to work in one of the following areas:

- Coevolution between plants and microbes - Theoretical population genetics - Molecular evolution in plants - Plant genomics

For the Postdoc / Group Leader position, candidates should have a PhD degree in evolutionary biology, quantitative genetics, plant molecular biology or bioinformatics and a strong interest in genomic and/or quantitative approaches. You will have access to brand new state-of-the-art laboratory facilities and the opportunity to develop your own independent line of research. This position involves some teaching in the area of evolutionary biology and population genetics. The initial appointment is for three years with the possibility of extension for another three years. Salary will be according to the German governmental salary scale and depends on previous experience, age and marital status.

For the PhD student position, candidates should have a Master's degree in biology or related field and a strong background in plant genetics and evolutionary biology. The PhD student will conduct research on the coevolution and recognition specificity between Lotus species and their rhizobial symbionts. This project is funded by the German Science Foundation (DFG) and will involve functional studies on plants (inoculations with bacteria and trans-gene expression) and classical population genetics.

Please find further information about the lab and these positions at this website: http://evol.bio.lmu.de/_rose or by contacting me by email: rose@bio.lmu.de

Applications should be filed by September 30, 2010. Applicants should send a single PDF file containing a statement of research interests and previous research and teaching experience (when appropriate), full curriculum vitae, and contact information for at least two referees to: Dr. Laura Rose (rose@bio.lmu.de).

rose@zi.biologie.uni-muenchen.de

## EastCarolinaU EvolutionaryBiology

Evolutionary Biologist

The East Carolina University Department of Biology [http://www.biology.ecu.edu] seeks to build on a core strength in evolution by inviting applications for a tenure-track position in evolutionary biology at the rank of assistant professor to begin August 15, 2011. Will consider other titles based on degree and qualifications. Applications from individuals with research interests in the areas of biodiversity, systematics, molecular ecology, population genetics, or comparative biology are particularly encouraged. The successful candidate is expected to establish an externally funded research program; teach and advise undergraduate, Masters and Doctoral level students; and contribute appropriate service to the university, community and profession. Potential to form collaborations with members of the Department of Biology faculty and a number of other academic areas, institutes, and centers (e.g., the College of Technology and Computer Science, the Institute for Coastal Science and Policy, the Center for Sustainable Tourism, and the Coastal Science Institute at Manteo) and contribute to the recently formed North Carolina Center for Biodiversity is desirable.

Candidates should submit a letter of application, statements of research interests and teaching philosophy, and a curriculum vitae online. Also, arrange for three current letters of reference to be sent to: Evolutionary Biologist Search Committee Chair, Department of Biology - Mail Stop 551, Howell Science Complex, East Carolina University, Greenville, NC 27858-4353 or emailed directly to letsingerj@ecu.edu. Inquiries can be directed to Dr. Kyle Summers, Search Committee Chair, sum-

mersk@ecu.edu. Screening of applications will begin on September 20, 2010 and continue until the position is filled. Graduate transcript required upon employment.

East Carolina University is an Equal Opportunity/Affirmative Action University that accommodates individuals with disabilities. Individuals requesting a disability accommodation should call the ECU Office of Disability Support Services at [252] 737-1016 (Voice/TTY/Relay). Proper documentation of identity and employability are required at the time of employment.

"Rudel, David" <RUDELD@ECU.EDU>

## LehighU EvolBiol

EVOLUTIONARY BIOLOGY ASSISTANT PROFESSOR - Lehigh University

The Department of Biological Sciences seeks candidates at the Assistant Professor level with outstanding research that employs modern analytical methods in the study of fundamental aspects of the evolutionary process. Areas of specialization may include field and/or laboratory studies on molecular aspects of population genetics, molecular mechanisms of phenotypic expression, cell division, asexual or sexual development, neural/endocrine processes, genome conservation, or phylogeny. The successful candidate for this tenure-track position will have the potential or demonstrated ability to generate extramural funding and have a commitment to instructional excellence at the undergraduate and graduate levels.

The College of Arts and Sciences at Lehigh is especially interested in qualified candidates who can contribute, through their research, teaching, and/or service, to the diversity and excellence of the academic community.

Applications should be directed to: Evolutionary Biology Search Committee. E-mail: inbios@lehigh.edu. Send curriculum vitae, representative publications, description of research and teaching interests, and four letters of reference to the search committee chair electronically or to: Department of Biological Sciences, Evolutionary Biology Search, 111 Research Drive, Lehigh University, Bethlehem, PA 18015. Deadline for submission is October 15th, 2010.

Lehigh University is an Equal Opportunity Affirmative Action Employer and is committed to recruiting and retaining women and minorities.

–

Maria Brace <mpb3@lehigh.edu>

## Montpellier SouthAfrica FieldAssist CooperativeReproduction

Job

Field assistant: study on cooperative reproduction and maternal investment in the Sociable weaver (Philetairus socius) in South Africa

CEFE CNRS, Montpellier / Percy Fitzpatrick Insitute, university of Cape Town

We are looking for a volunteer field assistant to help with the monitoring of Sociable weaver's reproduction over a period of 3 months (from the end of September to the end of December) at Benfontein Game Farm near Kimberley, South Africa.

The work will include monitoring of breeding activity, behavioral observations, capturing and measuring birds and data entering. The candidate should have a strong interest in ecology and animal behavior and be able to work in a small team during long days in quite isolated field conditions. Previous field work experience on birds is preferable but not required.

We will cover food and accommodation and will be able to contribute towards traveling expenses.

If you are interested in applying and to learn more about the details of the project, please send us a CV and a short motivation letter.

Matthieu Paquet

matthieu.paquet@cefe.cnrs.fr

And also:

Rita Covas: rita.covas@cefe.cnrs.fr

Claire Doutrelant: claire.doutrelant@cefe.cnrs.fr

Matthieu PAQUET <Matthieu.PAQUET@cefe.cnrs.fr>

## OklahomaStateU Adaptation

Assistant Professor, Environmental Stress V Tenure-

track. The Department of Zoology at Oklahoma State University (http://zoology.okstate.edu) invites applications for an Assistant Professor in environmental stress. Areas of research emphasis could include, but are not limited to, natural and anthropogenic stressors, environmental physiology, toxicology, and global change. Applicants should have a Ph.D., post- doctoral experience, teaching experience, and success in obtaining extramural funding. Responsibilities include establishing an extramurally funded research program, mentoring M.S. and Ph.D. students, and teaching at the undergraduate and graduate level. To apply please 1) send a single pdf file composed of a cover letter, curriculum vitae, and separate statements of research interests and teaching philosophy; 2) send three publications; and 3) arrange to have three letters of recommendation sent in support. All of the items should be sent to the search committee chair, Dr. Jason Belden, at zoologysearch@okstate.edu. Application review will begin 8 October 2010, with employment beginning 1 January 2011. Filling of this position is contingent upon availability of funding. Oklahoma State University is an AA/EEO/ E:Verify Employer committed to diversity. OSU-Stillwater is a tobacco- free campus.

Puni Jeyasingh Department of Zoology, 501 Life Sciences West, Oklahoma State University, Stillwater, OK 74078-3052. Phone: (405) 744-9634. Fax: (405) 744-7824. http://web.me.com/-punidan/Jeyasingh/Jeyasingh_Lab.html Puni Jeyasingh <puni.jeyasingh@okstate.edu>

## PrincetonU EvolutionaryBiol

ASSISTANT PROFESSORSHIP

ECOLOGY, EVOLUTION AND/OR BEHAVIOR

Princeton University's Department of Ecology and Evolutionary Biology plans to hire a tenure-track Assistant Professor. We have broad interests in ecology, evolution, behavior, functional biology, conservation biology, biogeochemistry and disease dynamics. We seek applicants who pursue research that aims for significant conceptual and/or empirical integration across traditional disciplinary boundaries and who have a strong commitment to teaching. Applicants should write a vision statement, no longer than two pages, that outlines one or more major unsolved problems in their field and how they plan to address them. The vision statement should go beyond a précis of the applicant's prior and current research.

Applications, including the vision statement, a curriculum vitae, three reprints, and contact information for three references should be submitted online via http://-/jobs.princeton.edu, Req #1000647.

Any questions about the position should be addressed to Dr. Bryan Grenfell, the chair of the search committee. Screening of applications will begin 15 October 2010 and will continue until the position is filled. Princeton University is an equal opportunity employer and complies with applicable EEO and affirmative action regulations.

(Direct link to online posting: https://-jobs.princeton.edu/applicants/jsp/shared/position/-JobDetails_css.jsp?postingId=175203)

Diane Carlino Department Manager Ecology and Evolutionary Biology Princeton University 104A Guyot Hall 609-258-5810

dcarlino@princeton.edu

## RhodesCollege PlantEvolution

Evolutionary Biologist / Plant Biology

The Department of Biology at Rhodes College seeks qualified applicants for a tenure-track faculty position to begin in August of 2011. Candidates must have a Ph.D. and must have a background and expertise in both evolutionary and plant biology. Applicants should have a commitment to teaching undergraduates as well as to maintaining an active research program that engages undergraduate students. Normal teaching responsibilities will include an upper-level Evolution course plus a role in the introductory biology course sequence. Other teaching opportunities may include senior seminar, a course for non-science majors, or an additional course in the candidate's area of specialty. Of particular interest are courses in plant biology. We encourage applications from individuals whose interests go beyond traditional disciplinary boundaries. Information about the Department of Biology may be found at http://www.rhodes.edu/biology . Review of completed applications will begin October 4, 2010 and continue until the position is filled. Candidates from backgrounds typically underrepresented in higher education are strongly encouraged to apply. As Rhodes continues to diversify its student body, we also seek candidates with experience working with students from different

backgrounds. Completed applications will include a letter of application, a statement of teaching philosophy, a research plan, a curriculum vitae, copies of graduate and undergraduate transcripts, and three letters of recommendation.

Please apply online at https://jobs.rhodes.edu . For additional information regarding the position, please contact Gary Lindquester, Chair of the Search Committee, at glindquester@rhodes.edu.

Founded in 1848, Rhodes College is a highly selective, private, residential, undergraduate college, located in Memphis, Tennessee. We aspire to graduate students with a lifelong passion for learning, a compassion for others, and the ability to translate academic study and personal concern into effective leadership and action in their communities and the world. We encourage applications from candidates interested in helping us achieve this vision. Memphis has a metropolitan population of over one million and is the nation's 19th largest city. The city provides multiple opportunities for research and for cultural and recreational activities. Read more about Memphis at http://-www.rhodes.edu/about/369.asp. We are an equal opportunity employer committed to diversity in the workforce.

thomask@rhodes.edu

## SouthAfrica Meerkat Field Assistant

Volunteer field assistant needed to assist 1st year PhD student with a study on relations between hormones and cooperative behaviour in meerkats between October 2010 and April 2011.

Field work will take place at the Kuruman River Reserve, a remote study site in the southern Kalahari Desert in South Africa. Work days under desert conditions may be long and repetitive and will involve following habituated groups of meerkats to record behaviour and collect faecal samples. Living at the field site will be under basic conditions together with a team of 15 - 25 early career researchers and field assistants.

Food and accommodation will be provided, however, unfortunately my funding does not cover travel expenses and visa costs (together some £1000,-).

Previous experience with field work and remote living are a plus, but motivation and an easy going personality will be most important.

If interested, please send me a cover letter and CV at ps511@cam.ac.uk.

– Peter Santema PhD student Large Animal Research Group Department of Zoology University of Cambridge

http://www.zoo.cam.ac.uk/zoostaff/larg/Pages/-index.html ps511@hermes.cam.ac.uk

## UCLondon FullProf EvolBiol

For those who missed this while travelling over the summer:

UNIVERSITY COLLEGE LONDON Department of Genetics, Evolution and Environment

*Chair in Evolutionary and Population Biology*

Dear all,

The Department of Genetics, Evolution and Environment at University College London is seeking to fill a Chair (full professorship) in Evolutionary and Population Biology. The job ad has appeared in the July 9 issue of Science and is pasted below.

We are looking for excellent candidates; we are open with respect to approaches used (theory, bioinformatics, experimentation), level of investigation (cellular to ecosystems) and career stage (successful mid- career scientists or established leaders in their field).

*The closing date for applications is 3rd September 2010.*

The Department of Genetics, Evolution and Environment brings together scientists with interests in evolutionary, population and environmental biology, genetics, systems and theoretical biology and human genetics. The Department offers a dynamic and stimulating multi-disciplinary research environment and is part of a variety of cross-departmental and cross-institutional groupings within UCL and the wider London research landscape. From spring 2011, the department will be housed in re-furbished lab and office space on UCL's campus in the centre of London.

For more information on the Department, please visit our website (http://www.ucl.ac.uk/gee). For informal enquiries, please email the Head of Department, Prof. Andrew Pomiankowski (a.pomiankowski@ucl.ac.uk).

Best regards, Max

++

Advertisement in Science July 9th

*Chair in Evolutionary and Population Biology*

The appointment will be full time on the UCL Professorial grade. The salary range will be negotiable on the professorial scale but not less than £61,713 per annum, inclusive of London Allowance.

We invite applications from world class research scientists using theoretical or experimental approaches, with no restriction on organism or level of biological organisation studied. The appointment is part of a major initiative to strengthen and diversify research activity in evolutionary, population and environmental biology in newly refurbished laboratories within UCL.

The successful candidate will be expected to play a leadership role in this initiative and promote interaction across the diverse disciplines represented in the Department, the Division of Biosciences and across UCL, as well as co-ordinate efforts to respond to national and international funding initiatives. Furthermore, the successful candidate will play an important part in developing existing and new postgraduate training programmes and contribute to undergraduate teaching.

The successful candidate will have an international reputation in an area of Evolutionary and Population Biology and a track record of running a successful research group, securing competitive funding over a number of years and publishing high impact original research articles.

For further details about the vacancy and how to apply online please go to http://www.ucl.ac.uk/hr/jobs/ and search for Reference Number 1127113.

Informal enquiries may be made to Professor Andrew Pomiankowski, tel: +44 (0)20 7679 7413; email:a.pomiankowski@ucl.ac.uk. Queries regarding the application process should be addressed to Nick McGhee, tel: +44 (0)20 7679 8878; email: n.mcghee@ucl.ac.uk.

Closing Date: 3rd September 2010. Interview Date: Week commencing 11th October 2010.

We particularly welcome female applicants and those from an ethnic minority, as they are under-represented within University College London at this level.

Max Reuter

Research Department of Genetics, Evolution and Environment Faculty of Life Sciences University College London 4 Stephenson Way London NW1 2HE, UK

Phone: +44-20-76795095 (internal 25095)

Lab: http://www.homepages.ucl.ac.uk/ ˜ ucbtmre/- Labsite/ Department: http://www.ucl.ac.uk/gee m.reuter@ucl.ac.uk

## UGeorgia ResTech BatRabiesEvolution

*Position opening: * Research Technician at the Odum School of Ecology, University of Georgia and Rabies Laboratory, Centers for Disease Control and Prevention, Atlanta, GA

Classification: Full time (40h/week)

Starting Salary: $27,000 with annual raise plus benefits Start date: September 1 or later Duration: Renewable annually depending on performance, with an expected duration of three years

*Job summary:*

The Altizer lab in the Odum School of Ecology at the University of Georgia is seeking a highly motivated research technician to assist with an NSF-funded collaboration with the Rabies Laboratory of the Centers for Disease Control and Prevention (CDC). Research will focus on understanding how anthropogenic environmental changes in Latin America, including deforestation and agricultural intensification, influence vampire bat populations and, in turn, how these affect the transmission dynamics of rabies with bats and from bats to humans or domesticated animals. The technician will be stationed at the laboratory of Dr. Charles Rupprecht in the Poxvirus and Rabies Branch in the National Center for Zoonotic, Vector borne and Enteric Diseases at the Clifton Road campus of the CDC in Atlanta, GA. The technician will also work in close coordination with graduate students and a post-doctoral associate from the Altizer lab at the University of Georgia in Athens, GA.

For more information on the Altizer lab and the vampire bat rabies project visit: http://www.uga.edu/-altizerlab/ and http://dstrike.myweb.uga.edu/

*Responsibilities:*

The technician will assist with tasks necessary to conduct captive experiments and perform serological and genetic assays on blood and tissue samples collected in field studies. Specific duties will include inoculation, sampling and monitoring of captive vampire bats, assessing immunological responses to infection and monitoring viral excretion using molecular genetic tools.

The role of the technician is viewed as an active collaborator in this research and he/she will be encouraged to participate in data analysis and project development whenever possible. The technician can expect laboratory training in cell culture techniques in virology, serology, RT-PCR and sequencing, as needed. The technician may also assist with daily management of the laboratory, including purchasing, equipment maintenance and database management.

*Qualifications:* The successful applicant will be energetic with a strong work ethic and a demonstrated ability to work independently and as part of a team. Applicants should minimally have a Bachelor's degree in biology, ecology, genetics or a related field, and should have experience in either laboratory work or animal handling. Experience working in BSL-2 or BLS-3 laboratories is preferred, but not required. Special consideration will be given to applicants with a strong interest in the ecology and evolution of infectious diseases, wildlife management, public health or veterinary medicine, and any previous experience in rabies research, laboratory diagnostics, and skills in working with bats. Applications from international candidates, such as Peruvian nationals, are encouraged.

*To apply:* Applicants should visit the UGA Human Resources website and upload the following information before 8/24/2010: 1) a cover letter describing motivations and qualifications for this position

2) a curriculum vitae containing relevant information on educational training and research experience 3) the names of three professional references

Web address: https://www.ugajobsearch.com/-applicants/jsp/shared/Welcome_css.jsp Title: RESEARCH TECHNICIAN III Posting Number: 20100981 Department: 551-School of Ecology

Applicants may also wish to send a backup copy of their materials as a pdf file to: saltizer@uga.edu <mailto:danbolnick@mail.utexas.edu>

– Sonia M. Altizer, Assoc. Professor Odum School of Ecology University of Georgia Athens, GA 30602

Ph: 706-542-9251 Email:saltizer@uga.edu URL:www.uga.edu/altizerlab www.ecology.uga.edu/-altizer saltizer@uga.edu

## UGeorgia ResTech EvolGeneticsOfAging

Research Technician at The University of Georgia

The Promislow lab at the University of Georgia is looking for full time Research Technician III. Our research uses quantitative genetic and molecular approaches to understand the role of aging in somatic mutations, and in metabolic networks. The work will involve experiments with Drosophila (crosses, measures of age-specific fitness traits, dissection), and some molecular biology techniques (DNA/RNA extraction, RNA sequencing). Additional responsibilities will include maintaining Drosophila stocks, supervising undergraduate researchers, ordering lab supplies, and maintaining safety records. Applicants should have a minimum of a Bachelors degree in a Biology-related eld, previous experience in biological research, and strong interpersonal communication skills. Experience with molecular techniques and working with Drosophila or other insects is preferred. The ideal candidate will be organized, pay close attention to detail, and be able to work both independently and in collaboration with others. Applicants may contact me directly at promislow@uga.edu with informal questions, but are required to apply through the UGA Human Resources website (posting number 20100996 in Genetics [unit 093] at https://www.ugajobsearch.com). The position is available immediately and applications will be reviewed until the position is lled. Salary is commensurate with experience and will include benets. The Promislow lab is a part of the diverse and interactive UGA Genetics Department, for which more information can be found at http:// www.genetics.uga.edu/. The University of Georgia is located in Athens, GA. Athens is located about an hour from Atlanta and is consistently ranked one of the top college towns in the country. It has a vibrant music scene, plentiful opportunities for outdoor recreation, and a reasonable cost of living. For more information about living in Athens, see http://-www.visitathensga.com/ Daniel Promislow, Professor, Department of Genetics University of Georgia Athens, GA 30602-7223 email: promislow@uga.edu

Daniel Promislow <promislow@uga.edu>

## UMainz 6year BehavioralEvolution

University of Mainz

Assistant professor / wissenschaftlicher Assistant - Behavioral / Evolutionary Ecology

(non-tenure track, 6 years - extendable up to 10 years)

Closing date: 30.09.2010

We invite applications for three open *Assistant professor / wissenschaftlicher Assistent *positions in the newly established evolutionary biology group at the Institute of Zoology at the Johannes Gutenberg University of Mainz, Germany.

We are seeking highly motivated researchers with a PhD and Postdoctoral Experience and a background in behavioral or evolutionary ecology. Three new junior research groups will be established associated to the new evolutionary biology group of Prof. Susanne Foitzik, who recently moved from Munich. Successful candidates should work in related research areas, for example on the behavior or ecology of (social) insects, host-parasite coevolution, population genetics, chemical ecology, experimental evolution or theoretical evolutionary biology. Information on Prof. Susanne Foitzik's research can be found at http://ecology.bio.lmu.de/etho_e/index.htm, or by directly contacting her: foitzik@biologie.uni-muenchen.de. Excellent research conditions will be found at the newly renovated and well equipped behavioral, genetic and chemical laboratories in Mainz. Furthermore, new climate rooms and chambers are available for animal maintenance.

Successful candidates should have an excellent publication record. Experience with grant acquisition and teaching is advantageous. The candidates should set-up independent research labs and are encouraged to apply for grants in Germany or abroad (e.g., DFG, Eu). The positions come with a teaching requirement of 4h per week during the semester. Some basic zoology classes have to be taught in German. Therefore, willingness to learn the German language is required. The candidates have the option to acquire a "Habilitation". Working language of the lab is English.

The Johannes Gutenberg-Universität Mainz is interested to increase the number of women in Science. Applications from female scientists are strongly encouraged. Similarly qualified candidates with disabilities will be preferred.

The university of Mainz hosts many excellent scientific institutions http://www.uni-mainz.de/eng/ and Mainz is a historic city located at the river Rhine with many students and a rich social and cultural life (http://www.mainz.de/WGAPublisher/online/html/default/hpkr-5nkek8.en.html).

Interested candidates should send applications as a single e- mail attachment containing a CV, a list of publications (including reprints of the three most important publications), a research and teaching statement and the addresses of two potential referees to:

Prof. Dr. Susanne Foitzik Evolutionary Biology Institute of Zoology Johannes-v.- Müller-Weg 6 55128 Mainz Germany foitzik@biologie.uni-muenchen.de

Closing date for application is September 30th, 2010 Starting date for the positions is Winter – Spring 2011

Prof. Dr. Susanne Foitzik Department Biologie II Behavioral Ecology (Verhaltensökologie) Ludwig-Maximilians-Universität München Großhaderner Str. 2 D - 82152 Planegg / Martinsried Germany

Phone: + 49 89 / 2180 74 209 Fax: + 49 89 / 2180 74 221 e-mail: foitzik@biologie.uni-muenchen.de http://ecology.bio.lmu.de/etho_e/index.htm Susanne Foitzik <foitzik@zi.biologie.uni-muenchen.de>

## UMichigan 3 ComputationalBiol readvert

Ecology and Evolutionary Biology University of Michigan

The Department of Ecology and Evolutionary Biology at the University of Michigan invites applications for three tenure-track positions (open rank) in evolution, one of which will be in the area of computational biology. We seek outstanding individuals with research and teaching interests in evolutionary biology or evolutionary ecology. These searches are part of a hiring initiative to expand the evolution program, which includes a coordinated university-wide effort of integration with the computational sciences. Areas of research include evolutionary or ecological genetics and genomics, computational evolutionary biology, evolutionary theory, phylogenetics, and evolution of morphology, function, and behavior. Also strongly encouraged are research programs that take advantage of the outstanding collections of the Museum of Zoology, Herbarium, and Museum of Paleontology. For further information, see http://eeb.lsa.umich.edu < http://eeb.lsa.umich.edu > . To apply, please begin at www.lsa.umich.edu/eeb/apply/evolsearch < http://www.lsa.umich.edu/eeb/apply/evolsearch > , and arrange to have three letters of recommendation submitted through the same website. Review of applications will begin on 15 September 2010.

"Knowles, L" <knowlesl@umich.edu>

## UMichigan 3 EvolBiol readvert

Ecology and Evolutionary Biology University of Michigan

The Department of Ecology and Evolutionary Biology at the University of Michigan invites applications for three tenure-track positions (open rank) in evolution, one of which will be in the area of computational biology. We seek outstanding individuals with research and teaching interests in evolutionary biology or evolutionary ecology. These searches are part of a hiring initiative to expand the evolution program, which includes a coordinated university-wide effort of integration with the computational sciences. Areas of research include evolutionary or ecological genetics and genomics, computational evolutionary biology, evolutionary theory, phylogenetics, and evolution of morphology, function, and behavior. Also strongly encouraged are research programs that take advantage of the outstanding collections of the Museum of Zoology, Herbarium, and Museum of Paleontology. For further information, see http://eeb.lsa.umich.edu < http://eeb.lsa.umich.edu > . To apply, please begin at www.lsa.umich.edu/eeb/apply/evolsearch < http://-/www.lsa.umich.edu/eeb/apply/evolsearch > , and arrange to have three letters of recommendation submitted through the same website. Review of applications will begin on 15 September 2010.

"Knowles, L" <knowlesl@umich.edu>

## UNewSouthWales ResAssoc EvolutionMtDNA

Research Associate Faculty of Science School of Biotechnology and Biomolecular Science REF. 7378NET

Salary Level A: A$71,250 - $76,209 per year, plus 17% employer superannuation, plus leave loading.

The Research Group of Professor Bill Ballard in the School of Biotechnology and Biomolecular Sciences (BABS) at the University of New South Wales, is seeking a Research Associate to work on a project entitled "Linking the genotype with the phenotype through mitochondrial bioenergetics".

The research group studies the mechanisms and selective forces that influence the evolution of mitochondrial DNA and have used it as a model to study the link between the genotype and phenotype. The project funding is to extend the project of Melvin et al. (2008) J. Mol. Evol. 66: 232. The specific goal will be to asses the naturally occurring variation at all complex IV loci in a population of African Drosophila and identify mutations that are predicted to be functionally significant based on the quaternary structure model. The functional significance of identified mutations will then be assessed. It is expected that this work will then be extended to mammalian populations. We seek somebody with skills and experience in evolutionary genetics. Expertise measuring mitochondrial bioenergetics would be an asset.

The successful applicant is expected to do empirical work, analyze data and write papers. Limited laboratory supervision while Professor Ballard is Head of School is required. The applicant should be prepared to apply for fellowships in coming fellowship rounds, especially the ARC Discovery round in early 2011. Emphasis will be given to the quality of published research in our decision to appoint.

This is a full time position (35 hours per week), fixed term for 2 years.

Applicants should systematically address the selection criteria in their application.

Having read the documentation, you may then direct any enquiries to Professor Bill Ballard on +61 2 9385 2029 or email w.ballard@unsw.edu.au.

Applications close : 27 August 2010

For more information, application procedures or other vacancies, visit: http://www.hr.unsw.edu.au/-services/recruitment/jobs/06081001.html Kind regards, Angela Teng Advertising Executive UNSW Marketing Services

The University of New South Wales UNSW SYDNEY NSW 2052 AUSTRALIA t: (+612) 9385 1698 | f: (+612) 9385 8797 e: angela.teng@unsw.edu.au | w: www.unsw.edu.au CRICOS Provider no. 00098G

Angela Teng <angela.teng@unsw.edu.au>

albach@gmx.net

## UOldenburg LabTech PlantMolSyst

Lab technician - University of Oldenburg, Germany

A full-time position is offered starting on November, 1st, 2010 in the department of biology and environmental sciences of the faculty of mathematics and science of the Carl von Ossietzky-university Oldenburg, in the working group biodiversity and evolution of plants as lab technician in the area of molecular systematics (salary level up to TV-L 9 depending on qualifications).

Responsibilities include apart from normal lab duties and help in the preparation of student practicals a range of techniques related to evolutionary biology and molecular systematics as well as maintenance of a DNA sequencer. Furthermore, the position requires help in further techniques in the lab, the herbarium and plant propagation and investigation as well as support in the lab for candidates and foreign guests.

Necessary qualifications are a completed education as technician or bachelor of science. Employment with higher university degrees is possible with time reduction (M.Sc. â ca. 85%; PhD â ca. 70%).

Further necessary qualifications are experience with different DNA-techniques (extraction, PCR, gel electrophoresis, sequencing, fingerprint techniques), experience with handling DNA sequencers, good skills in English, basic skills in German with a willingness to learn the language, experience with lab management (ordering lab supplies, lab organization), training other laboratory users such as graduate students and postdoctoral fellows. We expect a high degree of self-responsible working and working in a team.

Women and disabled applicants with equal qualifications are preferentially employed. Questions regarding salary (approx. 2200 Euro before tax) can be answered by Mrs. Ursel Bunjes (ursel.bunjes@uni-oldenburg.de).

Interested applicants should send a cover letter detailing their experience and interests and a CV electronically or per mail until September, 18th, 2010 to Prof. Dirk Albach, Institut für Biologie und Umweltwissenschaften Carl von Ossietzky Universität Oldenburg, Carl von Ossietzky-Str. 9-11, 26127 Oldenburg or per email to dirk.albach@uni-oldenburg.de.

Prof. Dr. Dirk Albach

Alexandersfeld 49 26127 Oldenburg

## UParisSud EvolutionarySystemsBiol

Assistant professor position in biomathematics at the University of Paris-Sud, France : Modelling in Evolutionary System's Biology.

We are looking for a population geneticist with a strong background in mathematics or physics, or a mathematician or a physician with a strong knowledge in Biology. The research work will be on system's biology, at the interface between math and biology, to better understand the evolution of biological networks. The candidate will teachTeaching will be in mathematics, biostatistics and bioinformatics at the licence and master level for biology students of the University of Paris-Sud. The candidate will join the GQF team at the UMR du Moulon (http://www.moulon.inra.fr)

The position should be opened in spring 2011. Applicants NEED to be qualified by the French ministry of Research and Education as follows :

Deadline for the qualification = October 2010 Informations about the procedure: https://-www.galaxie.enseignementsup-recherche.gouv.fr/-ensup/candidats.html Application for the qualification: https://galaxie.enseignementsup-recherche.gouv.fr/-antares/can/index.jsp Foreign applications are welcome. Please contact-us before September 2010. We will help you with the qualification and application procedures.

Contact : Christine Dillmann, dillmann@moulon.inra.fr –

Les acquis de plusieurs mois de grèves et de manifestations contre les réformes de l'enseignement supérieur et de la recherche sont extrêmement limités. L'UMR de Génétique Végétale reste donc mobilisée et vigilante. Pour plus d'information : http://moulon.inra.fr/-SGV/moulon_en_lutte.html Despite the ongoing efforts of faculty and researchers against the proposed governmental reforms of research and higher education in France, there has been very little progress in achieving meaningful dialog. The UMR Le Moulon therefore remains mobilized to achieve reforms that support and strengthen public universities and research institutions. For more information: http://moulon.inra.fr/SGV/-moulon_en_lutte.html Christine Dillmann Professeur à l'Université Paris-Sud UMR de Génétique Végétale

Ferme du Moulon 91190 Gif sur Yvette, France tel : +33 1 69 33 23 48 fax : +33 1 69 33 23 40

dillmann@moulon.inra.fr

## USoutherCalifornia LosAngeles MolEvolutionaryGenomics

Faculty Position in Molecular Evolutionary Genomics.

The Molecular & Computational Biology Section of the Department of Biological Sciences in the College of Letters, Arts & Sciences at the University of Southern California invites applications for a tenure- track Assistant Professor in Molecular Evolutionary Genomics We seek an innovative, productive scientist using genomic approaches rooted in cell and molecular biology. The position will be in the Molecular and Computational Biology Program, which is a unique collaborative environment with strong expertise in the generation and quantitative analysis of molecular biology data. The MCB Program includes an NIH Center of Excellence in Genomic Science with a special emphasis on genotype to phenotype mapping.

This position provides opportunity for collaboration within and beyond the Molecular and Computational Biology Section, including with the Neurobiology Section, Marine and Environmental Biology Section and Integrative Biology Program. Strong links to world-class epidemiology and epigenetics research groups on the nearby USC Health Sciences Campus are other important assets. Field studies can be enhanced by USCs Marine Biology facility housed on Catalina Island. The position will provide access to students in multiple graduate programs and a competitive start up package. The University of Southern California has extensive facilities for high performance computing, genomics, proteomics and metabolomics.

Our program has strength in a number of model systems using a variety of approaches, and has undergone a recent expansion, including occupancy of a new research building with modern animal facilities. For additional information please visit our website: http://college.usc.edu/bisc/people/jobsearch.cfm Review of applications will begin immediately. Please send a curriculum vitae, a statement of research objectives, and three letters of recommendation to: msearch@usc.edu by October 1. For more information, contact Norm Arnheim (arnheim@usc.edu) and Sergey Nuzhdin (snuzhdin@usc.edu), Search Committee co-Chairs, Department of Biological Sciences, RRI201, University of Southern California, Los Angeles, CA 90089-2910.

USC strongly values diversity and is committed to equal opportunity in employment. Women and men, and members of all racial and ethnic groups, are encouraged to apply.

Matt Dean <matthew.dean@usc.edu>

## UStAndrews 5year EvolutionaryBiol

The following fixed-term (5 year) lectureship at the University of St Andrews, Scotland, is suitable for Evolutionary Biologists

Title Lectureship in Biology - CD7318 Vacancy Description School of Biology £36,715-£45,155 per annum Start: September 2010 or as soon as possible thereafter Fixed term 5 years Job Description The School of Biology at the University of St Andrews is one of the leading departments of Biology in the UK. To fully embrace our diversity, we offer several different degree programmes, including Biochemistry, Cell Biology, Ecology & Conservation and Marine Biology as well as general Biology, and additional joint degree options.

We are now seeking to appoint a fixed-term Lecturer to provide undergraduate and graduate teaching in the areas of Biodiversity and Conservation and contribute to degree programmes within the School of Biology. You will prepare and deliver lectures, practical classes and tutorials in modules in the areas of Biodiversity and Conservation, as well as co-ordinating the overall delivery of a variety of modules. You will also possess a strong research background and publications in Biodiversity, Ecology and Conservation and be willing to conduct cutting-edge independent research as well as collaborating with colleagues in Evolutionary and Marine Biology, CREEM (Centre for Research into Ecological and Environmental Modelling) and Geosciences.

You will have a degree in biological sciences and will hold a PhD in Biodiversity, Conservation, Ecology or a related field. Experience of lecturing, tutoring and assessment at undergraduate or postgraduate in Biodiversity, Conservation, Ecology or a related field and a track record of research publications would be advantageous.

This is a fixed-term post until 2015 with an anticipated start date of September 2010 or as soon as possible

thereafter.

Informal enquiries to Prof Anne Magurran, email: aem1@st-andrews.ac.uk and for further information about the lab please visit: http://biology.st-andrews.ac.uk/staffProfile.aspx?sunID=aem1 .

Interview date: 27 September 2010

Please quote ref: CD7318

Closing Date: 6 September 2010

Further particulars: https://www.vacancies.st-andrews.ac.uk/welcome.aspx School of Biology £36,715-£45,155 per annum Start: September 2010 or as soon as possible thereafter Fixed term 5 years

_

Mike Ritchie School of Biology Dyers Brae House University of St Andrews St Andrews, Fife Scotland KY16 9TH

Phone 0 (44 outside UK) 1334 463495 Fax 0 (44 outside UK) 1334 463366

Websites: http://biology.st-andrews.ac.uk/ritchielab/ http://biology.st-and.ac.uk/supplemental/ritchie/-papers.aspx Mike Ritchie <mgr@st-andrews.ac.uk>

## UToronto ConservationBiology

Professor (Open-Rank) in Ecology and Conservation Biology

University of Toronto Scarborough

The Department of Biological Sciences invites applications for a tenure stream position (at the Assistant, Associate or Full Professor level) in Ecology and Conservation, to begin July 1, 2011. The successful applicant must have a strong publication record, evidence of a sustained and externally funded research program, and a proven commitment to graduate student supervision and training. Candidates with an active field program are especially encouraged to apply. The incumbent will be expected to take a leadership role in a planned Professional Master's graduate program in Conservation and Biodiversity. The University of Toronto is an international leader in biological research and education and the Department of Biological Sciences enjoys strong ties to other units within the University. More information about the multi-disciplinary department and its research can be found at www.utsc.utoronto.ca/biosci, as well as information on the graduate Department of Ecology and Evolution at www.eeb.utoronto.ca/-graduate and the University of Toronto's Koffler Scientific Reserve at www.ksr.utoronto.ca/.

The successful candidate will demonstrate excellence in research and have a strong commitment to excellence in teaching at both the undergraduate and graduate level. They will also be expected to participate actively in the Graduate Department of Ecology and Evolutionary Biology at the University of Toronto, and to undertake an active research program centered at the University of Toronto Scarborough.

Salary will be commensurate with qualifications and experience.

Applications must include a CV, statements of research and teaching interests and three representative publications. Applications must be submitted online at http://www.jobs.utoronto.ca/faculty.htm (Job Number 1000523). We encourage applicants to combine PDF or MS WORD documents into one or two files.

Applicants should also arrange that letters of reference from three referees familiar with the candidate's teaching and research be sent directly to:

Professor Greg Vanlerberghe, Chair

Department of Biological Sciences

University of Toronto Scarborough

1265 Military Trail

Toronto, ON M1C 1A4

Canada

or e-mailed to biologygeneral@utsc.utoronto.ca.

All materials must be received by Nov. 1st , 2010.

The University of Toronto is strongly committed to diversity within its community and especially welcomes applications from visible minority group members, women, Aboriginal persons, persons with disabilities, members of sexual minority groups, and others who may contribute to the further diversification of ideas. The University is responsive to the needs of dual career couples. The University of Toronto offers the opportunity to conduct research, teach, and live in one of the most diverse cities in the world. All qualified candidates are encouraged to apply; however, Canadians and permanent residents will be given priority.

Jessica Barnett

Assistant to the Chair

Dept. of Biological Sciences

University of Toronto Scarborough

Room SW421B

1265 Military Trail

Scarborough, Ontario M1C 1A4

416-287-7399; FAX 416-287-7676

Jessica Barnett <jbarnett@utsc.utoronto.ca>

## UTubingen EvolGenetics

Research Associate in Evolutionary Genetics

University of Tübingen, Institute of Evolution and Ecology, Group of Comparative Zoology

The research group of Katharina Foerster seeks a highly motivated team-oriented researcher with a strong background in molecular ecology, evolutionary genetics and/or population genetics. The person appointed is expected to lead the DNA lab, participate in ongoing projects, develop an independent research programme, teach (4 hours/week and semester) and supervise bachelor and master students.

The candidate will have a PhD in a relevant area of biology, a strong postdoctoral research record in one or more of the above named fields, and good skills in statistics. He/she will be involved in the startup of new research projects. Self-motivation and the willingness to work effectively and flexibly within a multi-disciplinary team will be essential. The working language in the lab will be English. However, for everyday life at the University and in Tübingen a willingness to learn German will be advantageous.

The newly established Chair of Comparative Zoology at the University of Tübingen will combine molecular genetic analyses with life history, behavioural, physiological, and morphological data collected in wild populations of various species to investigate the forces that may maintain genetic diversity in the wild. Our interests focus on behavioural ecology, molecular ecology, population genetics and quantitative genetics. Currently, we plan to establish two new long-term projects on harvest mice and on alpine newts, but we are open to include other types of organisms.

We are part of the Institute of Evolution and Ecology, a young and lively mix of experts ranging from vegetation ecologists to animal physiologists. This institute is a founding member of the recently established Evolution& Ecology platform EvE. Eve unites scientists working in the broad field of evolution and ecology in Tübingen, and it organises joint research and teaching, scientific meetings and public events. This environment offers excellent opportunities for professional feedback and interdisciplinary collaborations.

This is a fixed-term position, available from 01. October 2010 for 4 years, with option for extension. The salary will be according to a public service position in Germany (TV-L 13).

Applications will be reviewed from August 23, 2010 until the position is filled.

Please contact us for any further information: sekretariat.zoologie@uni-tuebingen.de

To apply, please send an email with a single file attachment including your CV, a short description of your research interests and research experience (including a list of methods you are familiar with), and names and email addresses of 2-3 references who could be contacted to:

Professor Katharina Foerster at sekretariat.zoologie@uni-tuebingen.de

Tübingen is situated in Southern Germany between the Black Forest and the Swabian Alb, not far from Stuttgart. The charming university town of 87,000 inhabitants and 22,000 students combines the flair of a restored medieval old town with the colourful bustle and typical atmosphere of a young and cosmopolitan students' community. Tübingen features numerous cafes, beer gardens, restaurants and pubs as well as an active music and theatre scene.

katharina.foerster@zool.uni-tuebingen.de
katharina.foerster@zool.uni-tuebingen.de

## UVirginia ResTech PlantOrganelleGenomics

Research Technician at the University of Virginia

The Taylor Lab at the University of Virginia Biology Department is looking for a full-time research technician to assist in studies of the molecular evolution of plant organelle genomes. This project aims to address fundamental questions about the role of mutation rate in genome evolution and the interaction between organelle and nuclear genomes. The responsibilities for this position will include a combination of lab work (DNA/RNA extraction, PCR, DNA sequencing, etc.) and greenhouse work. The position will include train-

ing in the use of high throughput DNA sequencing technologies (454 and Illumina), but previous experience with these methods is not required. Applicants should have a bachelor's degree in biology or a related field and experience with basic laboratory techniques, including DNA extraction, PCR, and traditional (Sanger) DNA sequencing.

Application materials, including a CV and cover letter, can be submitted to the University of Virginia's human resources department via the following link, which also provides a more detailed description of the position.

jobs.virginia.edu/applicants/Central?quickFinda754

Doug Taylor Professor and Chair Department of Biology University of Virginia Charlotteville, VA 22904 USA e-mail: drt3b@virginia.edu

drt3b@virginia.edu

## UWollongong EvolutionaryBiologist

Lecturer level B Faculty of Science, School of Biological Sciences, University of Wollongong, Australia

Applications are sought for a tenure-track Lecturer position (Lecturer level B) in the School of Biological Sciences at the University of Wollongong. We are seeking candidates in the broad area of evolutionary biology. Applicants with research interests that would lead to productive collaborations with current academic staff are particularly encouraged. Demonstrated excellence in research and the potential to attract external research funding is essential. The appointee will be expected to develop a research program within the School and to supervise honours and postgraduate research students. The University of Wollongong has recently built a state-of-the-art research facility for contained animal and plant experiments, comprising 576 m2 of laboratory space. The appointee will be expected to become a member of and contribute to the Institute for Conservation Biology and Environmental Management (ICBEM), a key area of research strength within the University. The appointee will be expected to teach at all levels in subjects dealing with evolution, behaviour, ecology and/or physiology.

Applicants must address the selection criteria specified in the Position Description, which is available from the University Website. Further information can be obtained from Associate Professor Mark Dowton, by telephone (+61 2) 4221 3429 or by email (mdowton@uow.edu.au). Information about the School can be obtained from our website (http://www.uow.edu.au/-science/biol/).

Applications Close 26th September 2010 Quote Ref No: 23678

how to apply: Please go to our website http://-employment.uow.edu.au/ to submit your application online & for more information about the position and UOW.

Professor David Ayre Director Institute for Conservation Biology School of Biological Sciences University of Wollongong Wollongong NSW 2522 Australia

dja@uow.edu.au

## UZurich EvolAdaptEnvChange

The Faculty of Science at the University of Zurich invites applications for a

Professorship in Evolutionary Adaptation to Environmental Change

The newly founded Institute of Evolutionary Biology and Environmental Studies conducts research in the areas of ecology, evolution, behaviour and the environment. We seek outstanding, innovative applicants with a record of excellence in research who will complement our existing interests and strengths.

The successful candidate is expected to develop a strong, indepen- dent program of empirical research that integrates both evolutionary and environmental aspects, to attract external funding, and contribute to graduate and undergraduate teaching (in English or German). The position will be preferentially at the level of associate or tenure- track assistant professor. The University of Zurich provides generous research support, including earmarked funds for personnel and running expenses, and competitive start-up packages.

Zurich offers a stimulating scientific and cultural environment, including a rich spectrum of research activities in life sciences, and provides extensive opportunities for collaborations with research groups at the Faculties of Science and of Medicine of the University of Zurich, as well as teams at the nearby ETH Zurich.

Application packages should include a full curriculum vitae (see http://www.ieu.uzh.ch/static/documents/- for guidelines), an intro- ductory summary, a vision

statement of research interests outlining major unsolved problems and how they could be tackled, and the names and addresses of four potential referees. Documents should be addressed to Prof.Michael Hengartner, Dean of the Faculty of Science, University of Zurich, and submitted as a single PDF file to jobs@mnf.uzh.ch by September 30, 2010. For further information, please contact Prof. Andy Hector at andrew.hector@uzh.ch. The University of Zurich is an equal opportunities employer. Applications from women are particularly encouraged (see CV guidelines).

Lukas Keller <lukas.keller@ieu.uzh.ch>

## WakeForestU ResTech EvolutionaryGenetics

I am looking for a full-time research technician for an evolutionary genetics lab using yeast for evolution experiments that test theories on a variety of broad topics, such as the evolution of sex, the evolution of organelle inheritance, and speciation. The position is initially for one year, with possible extension.

A bachelor's degree in biology and research or job experience in a lab are required. Experience with culturing and genetically manipulating microbes is strongly preferred, and an interest in evolutionary biology would be a great asset. If interested please e-mail me at zeylcw@wfu.edu

Clifford Zeyl

Associate Professor, Department of Biology

Wake Forest University

Winston-Salem, NC USA

phone: 336 758-4292

fax: 336 758-6008

clifford.w.zeyl@gmail.com

## WillametteU EvolutionaryMicrobiol

Attached and pasted below is the info about an upcoming review deadline (15 Sept 2010) for applicant files for our tenure track-position at Willamette University. As indicated below, the person's focus relative to microbiology is open in this search provided s/he meets the eligibility criteria, can teach a microbiology course, and will engage undergraduates actively in their area of expertise.

Applicants with questions about the position, as noted below, should contact our chairperson who is also copied here:

Dr. David P. Craig, "David P. Craig" <dpcraig@willamette.edu>

Assistant or Associate Professor, Microbiology

Willamette Universitys Biology Department invites applications for a tenure-track position in microbiology at the rank of assistant or associate professor to begin August, 2011. The nine-member undergraduate department values innovative teaching and research and seeks to integrate them seamlessly into high impact learning experiences for students at every level of the curriculum. For information about the department see http://www.willamette.edu/cla/biology . The successful candidate will teach an introductory microbiology course that emphasizes viruses and bacteria; upper level courses for majors in his/her area of expertise; and courses for non-science majors. The candidate will be expected to establish a vigorous research program that advances science while engaging undergraduates.

Applicants from disciplines as diverse as virology, bacteriology, mycology, genetics, genomics, physiology, ecology, and/or evolution are welcome. Applicants must have a Ph.D. and post-doctoral research experience and must be qualified by their formal training to teach the courses described. To be considered at the associate level, applicants must have an exceptional record of research and undergraduate teaching commensurate with their rank.

To apply:

(a) Submit to micro-search@willamette.edu a single, electronic PDF that contains these materials in the following order: 1) A cover letter describing your interest in the position 2) Current curriculum vitae 3) A teaching statement that describes your teaching experience and philosophy, plans for an introductory microbiology course, and a list of courses you feel qualified to teach 4) A research statement that includes current and future research goals and plans and their relevance to this position 5) A diversity statement that describes your experience with diverse populations and the importance of diversity in teaching and research communities 6) An unofficial graduate transcript (b) Solicit three reference letters that address both research and teaching potential as they relate to this position. Reference letters

should be sent electronically to:

David Craig, Search Chair Biology Department Willamette University micro-search@willamette.edu

Address inquiries to David Craig, dpcraig@willamette.edu

Review of applications will begin on September 15, 2010.

skephart <skephart@willamette.edu>

# Other



## AcademicGenealogy EvolutionaryBiology

The Academic Genealogy of Evolutionary Biology has been launched and is being hosted by http://academictree.org/ http://academictree.org/-evolution/index.php The Academic Genealogy of Evolutionary Biology is a free, volunteer-run website designed to help you track your academic genealogy. Our goal is to collect information about the graduate student and postdoctoral connections between most researchers in the field.

Please add yourself and your PhD and post-doc mentors – once the tree is seeded with ~200 names the tree will be linked to academictree.org's main page. Note that there is a Drosophila Genetics tree, and entries can be cross-listed among trees. Contributors can add anyone, but site editors will be maintaining the page to guard against vandalism and jokesters.

"Baucom, Regina (baucomra)" <baucomra@ucmail.uc.edu>

## AFLPdat sample file

Hi All,

I'm having trouble with getting an acceptable input file for AFLPdat to use in R. I keep getting unexpected symbol errors in first row second column even though it looks exactly the same as in the manual. There

was no sample file to go along with the software. If anyone has a sample input file with a populations column and recessive allele row, could you kindly send it: bsp22e@bangor.ac.uk.

Thank you, Mrinalini Bangor University

bsp22e@bangor.ac.uk

## Aligning fragments

Hi,

For a specific protein family, I have 39 complete sequences from sequenced bacterial genomes; I also have many incomplete sequences from metagenome. I know they are fragments of complete sequences.

Is there anyway to do accurate multiple sequence alignment for all these complete and fragmentary protein sequences>

Thanks!

Haiwei Luo University of Georgia

Haiwei Luo <hluo2006@gmail.com>

## BEAST question

Hi all,

I constructed a phylogenetic tree of 50 protein orthologs using BEAST, with the strict clock model and a upgma starting tree. However, the output tree obtained from TreeAnotator turns out to be not ultrametric. Is it because of the wrong molecular clock I chose (should I instead chose relaxed time clock) or do I need to convert the tree into ultrametric using some software? Which software performs best to convert the ultrametric tree? Thanks in advance!

Sincerely,

shan

Shan Li Bioinformatics UNC Charlotte

Shan Li <lishan989@gmail.com>

## DNA from FormalinFixedBone

Dear List:

I am looking for protocols for extracting DNA from bone and from formalin-fixed tissues. I've tried a few in the literature without success. I'm looking to extract from museum specimens of turtles. If anyone has had success with this, would you please suggest a protocol.

Thanks, Steve

– Steve Kimble PhD student, Department of Forestry and Natural Resources Purdue University skimble@purdue.edu sjkimble@gmail.com 205.337.4843 http://web.ics.purdue.edu/~rodw/Steve%20Kimble.htm steve kimble <sjkimble@gmail.com>

## DNA sequencing from formalin tissues

Hi all,

I am attempting to extract DNA for sequencing from formalin fixed and stored larval fish tissues. I was curious if anyone had any good protocols or tips and tricks to help me accomplish this task. My ultimate goal is to get a long enough sequence to be able to compare to a known adult sequence and confirm identification.

Thanks so much,

Carie Bikson UW Fish Collection University of Washington, Seattle, WA cbikson@uw.edu

cbikson@u.washington.edu

## DPGP New Data and Collaborative Opportunities

DPGP: Transitional data sets, opportunities for collaboration

DPGP's analysis of 42 Drosophila melanogaster genomes is essentially complete, and a manuscript will be submitted in the very near future. Further questions should be directed to Chuck Langley or Dave Begun.

D. melanogaster genome sequencing has continued at Davis, with a focus on African variation. With the goal of identifying one or two locations in Africa that merit genome sequencing of large population samples, we have initially sequenced a geographically scattered sample of sub-Saharan genomes: a median of three genomes from each of approximately 20 African locations, with a few more to be added. Preliminary analysis of this data motivated us to obtain new, large population samples from Uganda and Zambia (described in a subsequent message). But prior to the sequencing of large samples, the scattered sample itself (which may ultimately contain roughly 80 African genomes) will be one target of analysis, with relevance for understanding the history of the species in its ancestral range, and possibly for detecting local adaptation.

While the new Uganda and Zambia samples were being obtained, a second data set was created, consisting of 27 D. melanogaster genomes from Rwanda. Here the goal was to give the research community access to a somewhat larger sample of African genomes in the short term. The Rwanda genomes (along with most of the data in the scattered sample) are >30X sequence depth (75bp paired-end reads) from libraries of prepared from whole genome amplifications of single haploid embryos (see second message). This data is from 75bp paired-end reads (300 to 400 bp inserts), which will offer new opportunities for studying indels and rearrangements. It is anticipated that the Rwanda genomes and the scattered African genomes will be published separately, with the Rwanda genomes analysis likely to begin first.

Data generation for both of these projects is nearing completion. Sequencing reads will be deposited the NCBI archive. We will generate an assembly for each data set, and share this with the research community. It will probably be at least one month before the Rwanda assembly is ready, and at least two months for the scattered African assembly.

We are interested in pursuing a different model of community involvement with the analysis of these data sets. Rather than composing a "genome paper" on our own and encouraging the community to pursue independent analyses, we would like to involve more of the research community in the initial analysis of both new data sets. Please contact me if you are interested in being a part of this collaboration.

John Pool (jepool(a)ucdavis.edu)

Postdoctoral Researcher

Drosophila Population Genomics Project

UC Davis

jepool@ucdavis.edu

## Drosophila oviposition sites

Dear Evoldir members

A group of ecologist is exploring Drosophila oviposition sites in a Mediterranean habitat. Any information that could help us find these sites will be appreciated

Thank you

Gilad Danon.

Gilad Danon <giladgiladgiladgilad@gmail.com>

## Drosophila stocks

New isofemale strains Drosophila species: The UCSD Drosophila Species Stock Center has isofemale strains of two species:

14 new Drosophila wheeleri isofemale lines, Santa Catalina Island, California. 30 new Drosophila arizonae isofemale lines, cape region of Baja California, Mexico.

These will be available until November. See the stock center website at: https://stockcenter.ucsd.edu/info/-listannouncements.php Therese Ann Markow, Professor Amylin Chair in Life Sciences Section of Cell and Developmental Biology Division of Biological Sciences Muir Biology Building 2215 9500 Gilman Drive University of California at San Diego La Jolla, CA 92093-0116

Email: tmarkow at ucsd.edu Phone: (858) 246 0095 Laboratory: (858) 246 0402 FAX:(858) 534-7108

http://biology.ucsd.edu/labs/markow/ http://-/stockcenter.ucsd.edu Therese Markow <tmarkow@ucsd.edu>

## ESEB Outreach Fund

The European Society for Evolutionary Biology (ESEB) is pleased to announce a new Outreach Fund available globally to promote evolution-related activities, with a total annual budget of 10000 euros. The goal of this initiative is to promote knowledge about evolution to general public. Applications for funding will be accepted for educational initiatives that promote evolution, translation of evolutionary material (books, films, websites) intended for a general audience, public outreach seminars, public exhibitions, etc. The application form can be found on www.eseb.org (click on the "Outreach Fund" link). Applications will be accepted twice yearly (deadlines March 15, September 15) and should be submitted by email to Olga Vos <office@eseb.org> (Subject: Outreach).

otto@zoology.ubc.ca

## Ethiopia Volunteer CampManager

ONE camp manager needed for The University of Michigan Gelada Research Project, a study of the evolution, behavior, communication, endocrinology, and conservation of wild geladas (Theropithecus gelada) V a close relative of baboons. All research is conducted at a field station located in the Simien Mountains National Park of Ethiopia. Directors of the project are Drs. Thore Bergman and Jacinta Beehner, faculty at the University of Michigan. The camp manager will be responsible for (a) collecting basic demographic and reproductive data as part of routine monitoring of the well-habituated study population, (b) conducting focal animal samples and collecting fecal samples from individually-recognized geladas (for later laboratory steroid hormone analysis in the USA), (c) recording GPS readings of gelada ranging locations, (d) managing the computer database, and (e) equipment upkeep and personnel management. The gelada population has been studied on a near-daily basis since 2006 and we currently recognize approximately 150 individuals. The camp manager will live in a stone hut located in the national park with 0-3 graduate students (depending on the time of year), and 1-2 Ethiopian staff. Our camp includes one stone house with 3 bedrooms, a full kitchen set-up (including a propane-powered stove and oven), solar panels to power computers and lights, a generator (for electricity during the rainy season), a satellite telephone and modem (for email), a Mitsubishi 4x4 pickup truck, a shower tent (hot showers require heating up water on the stove). There is no running water at the fieldsite, but fresh water can be fetched from a nearby spring. Also, there is no refrigeration at the fieldsite, but we have a project freezer at a nearby eco-lodge (about a 30-minute drive away) where we can store things. For more information on the project directors, the project publications, and some photos of the fieldsite, please see the following websites: http://sitemaker.umich.edu/jacinta.beehner/home, and http://sitemaker.umich.edu/thore.bergman/home . Qualified applicants will have a B.S. or B.A in Evolutionary Biology, Biology, Zoology, Biological Anthropology, or a related field. Prior travel and/or field experience in Africa or mountainous regions of Asia or South America preferred. Applicants must be fluent in English and eager to learn Amharic (the national language of Ethiopia). Good physical fitness is essential - the terrain is hilly, the air is thin (due to the high elevation), and the temperatures can get quite cold during the rainy season (nights are sometimes below freezing and days can be cold). Good organizational skills and experience with basic database management a must. Must be able to drive a stick-shift 4x4 truck over rough terrain. Experience with leadership also a plus V as you will be managing several graduate students and field assistants.

Salary/funding: This is a volunteer position so there is no salary. However, round-trip airfare and living support will be provided for the volunteer (visa expenses, travel, meals, lodging). Additionally, volunteer will be provided with basic accommodation, food and other basic supplies while at the field site. The volunteer is responsible for any additional expenses incurred while traveling in Ethiopia. The project will provide travel health insurance, but the volunteer is required to acquire the necessary vaccinations prior to entry to Ethiopia. The volunteer will need to provide their own winter/alpine condition clothing, footwear and sleeping bag. Advice about what items are necessary for life in the Simien Mountains will be provided to the successful applicant.

Appointment: 1-2 years beginning mid October 2010. Because the training process requires 2-4 months, the successful applicant must be willing to work for a minimum of 1 year. Applicants committing to a longer period will receive one round-trip flight to their home

country halfway through their internship.

Deadline: Position will remain open until filled. Earlier applications will receive priority.

Application: Please email the following materials to Dr. Jacinta Beehner at jbeehner@umich.edu: (1) a letter of interest stating how and why this position satisfies your interest and future career goals, explaining your suitability for this project, plus a time frame during which you are available to work, (2) a CV or resume detailing relevant experience, (3) a summary of college courses taken and the grades received, to be followed by an official transcript, and (4) contact information for at least two references, preferably at least one academic reference as well as one person who has worked closely with you or who has closely supervised your work. The subject heading of the email message should read: for field research position.

Jacinta C. Beehner

— / —



## Evolution Meetings Survey

Dear Evol-Dir Members,

Have you attended the US Evolution meetings in the past? Do you plan to attend them in the future? If so, we'd like to get your input regarding childcare and MentorNet mentoring programs offered at the conference.

With funding from an Elsevier Foundation New Scholars Grant, on-site childcare and email-based MentorNet mentoring programs were offered for the first time at the Evolution 2009 conference in Moscow, ID, were recently offered at Evolution 2010 (Portland, OR), and will be offered again at Evolution 2011 (Norman, OK).

The survey will take about 5 minutes, and your responses are completely anonymous. Please click on the link below (or copy and paste into your internet browser) to complete the survey.

http://www.surveymonkey.com/s/F5S8VMV Thanks for taking the time to help out!

Heidi Meudt & Leah Larkin

Heidi Meudt, PhD

Museum of New Zealand Te Papa Tongarewa, PO Box 467, Cable St, Wellington, New Zealand, P +64 4 381 7127, F +64 4 381 7070 School of Biological Sciences, Victoria University, 1-85 Kelburn Parade, Room 507, New Kirk Building, Wellington, New Zealand, P +64 4 463 5026, F +64 4 463 5331 http://www.victoria.ac.nz/sbs/staff/heidi-meudt.aspx Visit the Te Papa website http://www.tepapa.govt.nz Heidi Meudt <HeidiM@tepapa.govt.nz>

## Fish DNA extraction

Hello all.

I am trying to extract DNA from fish muscle preserved in ethanol. I have had success with liver, heart, gonads, and blood. But, I have some important muscle samples that are yielding no DNA at all. These are relatively fresh samples. I have been using the QIAGEN DNeasy tissue kit. This is a rather oily fish, so I wonder if that is getting in the way. Although, I would expect that most of it would be washed off with the ethanol. I have also tried PCI based methods, and have had similarly little luck.

Any help on improving the yield would be greatly appreciated.

Thank you.

Anders.

Anders.Goncalvesdasilva@csiro.au

## Fish DNA extraction answers

Hello all.

I would like to thank all the members of the list who took the time to respond. I had quite a few protocols to test, and I think I have found one that works really well for my fish. A slightly modified protocol based on what Sarah Helyar (thank you so much, and yes we did meet in Seattle) sent me worked really well. CTAB, which was also another common suggestion, didn't work so well. Upon adding isopropanol, I get a viscous liquid that comes out of solution, and no DNA at the end of

the elution step. Depending on who you talk to they say this viscous substance is either SDS or polysaccharides. In any case, with a little RNAse, I was able to obtain about 15-20$\mu$g of DNA from 15-20mg of muscle with A260/A280 of around 1.8-2. Running a gel showed high molecular weight with little degradation. So, I was really pleased, as before I was not able to get any DNA at all.

Thanks again everyone, below I have posted all responses, which will hopefully be a resource to others.

All the best.

Anders.

– If I hear "slimy" or "oily" I have to think of this procedure:

Bahl, A., Pfenninger, M. A rapid method of DNA isolation using laundry detergent (1996) Nucleic Acids Research, 24 (8), pp. 1587-1588. Cited 30 times. http://www.scopus.com/inward/-record.url?eid=3D2-s2.0-0029923281&partnerID=-40&md5=60a69b5b3d97efc5de234209d7c40d04 Might be worth a try. The 2nd author is still active and might be responsive upon direct contact.

–

Have used a mixture of techniques with fish, from a high salt to using some other mystic witchcraft broth!

I should add, all these techniques seemed to work on blood, muscle tissue, and fin samples...if I was to choose one for muscle, perhaps the high salt one...

–

Maybe you could try the CTAB 2X protocol. It is a very efficient one and works very good on a wide range of organisms although initially used for plants. Land-snails that are covered with mucus are working fine with the CTAB protocol so maybe the oily substances of the fishes will be dealt with too. A google search with CTAB 2x will provide several protocols and you could use the one that better suits your needs. I wish you good luck.

–

I did extract DNA from frozen muscle with phenol cloroform protocol with excellent results, I also used QIAGEN DNeasy tissue kit and no problem.

–

we normally use the hexadecyltrimethylammonium bromide (CTAB) protocol for genomic DNA extraction from fish muscle preserved in ethanol. See attached an example of the protocol. It works also on very degraded samples, I used it also for total DNA extraction from fish gut content, following Deagle BE, Jarman SN, Pemberton D, Gales NJ (2005) Genetic screening for prey in the gut contents from a giant squid (Architeuthis sp.). Journal of Heredity 96: 417-423

–

Have you tried Chelex? I just started working on fish about a year ago, and the lab I am working in uses Chelex for fish muscle and scales–and it seems to work great. It's cheap and requires very little tissue and takes much less time than the Quiagen protocol.

–

am not sure that its the oil that's causing the problem if the liver was extracting ok, but anyhow, I generally use a very basic high salt protocol, so no phenol/chloroform steps, the yield from this is usually pretty high, it tends not to be the cleanest DNA, but for general applications like msats and SNPs, theres been no problem. We currently working on herring - so they're pretty oily too.

–

I used to work with muscle samples of Yellowfin Tuna. We used a regular precipitation with isopropanol and ethanol (a normal High salt protocol). I don't have the protocol just in hand but I think that you can find it everywhere. Consists of incubation with PK and Buffer, two precipation with isopropanol, and one with ethanol... and finally elution with water or TE...

–

You might consider rehydrating the samples by rinsing, then soaking them in water for ~15 minutes prior to using the kit. Sometimes this helps, and it is easy enough to try.

–

I would try one of the older chloroform or chloroform/phenol methods. Those reagents should get rid of extra lipids early on in the extraction process. Also, you might want to try increasing the detergent concentration a bit in the initial homogenates.

–

We do tons of fish here at the Smithsonian - muscle, eyes, fins, anything really. We basically have a DNA barcoding factory and having been going nuts with Caribbean fish.

Not sure what's going on with your extractions, but thought I'd share a few things that we've learned. You may already be doing all this.

-It is important to dry off as much of the ethanol from the sample as possible - dry it on a chem-wipe and maybe even let it air dry a bit. Or it sounds like you're

already rinsing it - we sometimes do that with the

— / —

This message has been arbitrarily truncated at 5000 characters. To read the entire message look it up at http://life.biology.mcmaster.ca/~brian/evoldir.html

## Free Beckman sequencer

Other: A Beckman CEQ 2000XL sequenzer for free If somebody can use a Beckman CEQ 2000XL sequenzer, they can get it for free. All you need to do is to arrange and pay for the pick up and transportation. The machine is functioning, and have mainly been used for fragment analysis, but have not been used for 2 $\frac{1}{2}$ years, and may need some kind of service. Maybe you can use it as spare parts for another CEQ 2000 or CEQ 8000. The Machine is standing in a lab close to Copenhagen, Denmark, from where we need to move by mid-September, so quick response is recommended.

Contact info: Ole K. Hansen, Forest & Landscape Denmark, University of Copenhagen. E-mail: okh@life.ku.dk, Phone: +45 35 33 16 47

Ole K. Hansen Cand.silv,PhD, Assistant Professor Forest & Landscape University of Copenhagen Address: Hørsholm Kongevej 11 2970 Hørsholm, Denmark Mail: okh@life.ku.dk Telephone Office: +45 35 33 16 47 Telephone DNA-lab: +45 35 33 19 42 Fax: +45 35 28 15 17 Private +45 39 65 07 00

okh@life.ku.dk

## GMOD Evo Hackathon Open Call for Participation

We are seeking participants for the GMOD Tools for Evolutionary Biology Hackathon, held November 8-12, 2010 at the US National Evolutionary Synthesis Center (NESCent) in Durham, NC.

This hackathon targets three critical gaps in the capabilities of the GMOD toolbox that currently limit its utility for evolutionary research: 1. Visualization of comparative genomics data 2. Visualization of phylogenetic data and trees 3. Support for population diversity and phenotype data

If you are interested in these areas and have relevant expertise, you are strongly encouraged to apply. Relevant areas of expertise include more than just software development: if you are a GMOD power user, visualization guru, domain expert (comparative, phylogenetics, population, ...), or documentation wizard, then your skills are needed!

How To Apply: Fill out the online application form at http://bit.ly/gmodevohack. Applications are due August 25.

About GMOD: GMOD is an intercompatible suite of open-source software components for storing, managing, analyzing, and visualizing genome-scale data. GMOD includes many widely-used software components: GBrowse and JBrowse, both genome viewers; GBrowse_syn, a comparative genomics viewer; Chado, a generic and modular database schema; CMap, a comparative map viewer; as well as many other components including Apollo, MAKER, BioMart, InterMine, and Galaxy. We hope to extend the functionality of existing GMOD components, and integrate new components as well.

About Hackathons: A hackathon is an intense event at which a group of programmers with different backgrounds and skills collaborate hands-on and face-to-face to develop working code that is of utility to the community as a whole. The mix of people will include domain experts and computer- savvy end-users.

More details about the event, its motivation, organization, procedures, and attendees, as well as URLs to the hackathon and related websites are included below.

Sincerely,

The GMOD EvoHack Organizing Committee (and project affiliations as relevant): Nicole Washington, Chair (LBNL, modENCODE, Phenote) Robert Buels (SGN, Chado NatDiv) Scott Cain (OICR, GMOD) Dave Clements (NESCent, GMOD) Hilmar Lapp (NESCent, Phenoscape, Chado NatDiv) Sheldon McKay (University of Arizona, iPlant, GBrowse_syn)

---

About the GMOD Evo Hackathon

Overview

We are organizing a hackathon to fill critical gaps in the capabilities of the Generic Model Organism Database (GMOD) toolbox that currently limit its utility for evolutionary research. Specifically, we will focus on tools

for 1) viewing comparative genomics data; 2) visualizing phylogenomic data; and 3) supporting population diversity data and phenotype annotation.

The event will be hosted at NESCent and bring together a group of about 20+ software developers, end-user representatives, and documentation experts who would otherwise not meet. The participants will include key developers of GMOD components that currently lack features critical for emerging evolutionary biology research, developers of informatics tools in evolutionary research that lack GMOD integration, and informatics-savvy biologists who can represent end-user requirements.

The event will provide a unique opportunity to infuse the GMOD developer community with a heightened awareness of unmet needs in evolutionary biology that GMOD components have the potential to fill, and for tool developers in evolutionary biology to better understand how best to extend or integrate with already existing GMOD components.

Before the Event

Discussion of ideas and sometimes even design actually starts well before the hackathon, on mailing lists, wiki pages, and conference calls set up among accepted attendees. This advance work lays the foundation for participants to be productive from the very first day. This also means that participants should be willing to contribute some time in advance of the hackathon itself to participate in this preparatory discussion.

During the Event

Typically, hackathon participants use the morning of the first day of the event to organize themselves into working groups of between 3 and 6 people, each with a focused implementation objective. Ideas and objectives are discussed, and attendees coalesce around the projects in which they have the most experience or interest.

Deliverables / Event Results

The meeting's attendance, working groups, and outcomes will be fully logged and documented on the GMOD wiki (http://gmod.org). Each working group during the event will typically have its own wiki page, linked from the main EvoHack page, where it documents its minutes and design notes, and provides links to the code and documentation it produces. Also, since GMOD and NESCent are both committed to open

— / —

This message has been arbitrarily truncated at 5000 characters. To read the entire message look it up at http://life.biology.mcmaster.ca/~brian/evoldir.html

## Goat Sheep hair DNAExtraction

Dear colleagues,

Does anybody knows a good protocol for DNA extraction from goat and sheep hair? (commercial or preferentially home made). I have some samples collected from different animals and I'd like to use them in genetic diversity studies. The samples have been collected from the animals' tails. In addition, Id like to know if anybody could suggest me the best way of storing these kind of material. I'll appreciate any information on this topic.

Thanks a lot, Fbio B. Britto Universidade Federal do Piau (UFPI) - Federal University of Piau Campus Universitrio Profa. Cinobelina Elvas BR 135, Km 03, Planalto Horizonte Cep 64900-000 Bom Jesus, PI

Brasil (Brazil)

Fabio Britto <fbbritto@yahoo.com>

## IsadoreNabi at 100

I am writing requesting information on the status and whereabouts of Isadore Nabi.

Isadore (variously spelled "Isidore" and "Isador") Nabi, if not one of the greatest evolutionary biologists of the 20th century, was certainly the most controversial.

If still alive, Dr. Nabi would have turned 100 on July 22nd. Despite his untimely obituary in Nature in 1981, like S. Clemens, the report of his demise was premature. He published at least as recently as 2002 in Gene Watch.

As a recipient of an encouraging letter from Dr. Nabi early my career, I have always held him in high regard. After finding his biography online today, I was shocked to see that his 100th birthday has come and gone without mention in evoldir.

If he remains alive, let us congratulate him on his tenacity for life, especially in a world that has grown unnecessarily serious. If he has passed, let us raise a toast

to the man who gave evolutionists a chance to smile at themselves.

Sincerely,

Norman Ellstrand Professor of Genetics

Norman Ellstrand <ellstrand@ucr.edu>

## Large African samples Drosophila melanogaster

This message is to update you on the progress of our recent sampling of D. melanogaster in Africa, and to make you aware of newly available population samples that we want to share with the research community. In July, large samples of isofemale lines were established from:

Uganda (~400 lines from Masindi) Zambia (~420, ~400, and ~85 lines from three separate locations - Livingstone, Siavonga, and Solwezi) South Africa (~240 lines from Phalaborwa in the northeast part of the country) France (~180 lines)

We anticipate sequencing perhaps 100 genomes each from France, Uganda, and Zambia (or possibly South Africa). Based on preliminary sequencing of African genomes (described in my previous message), our hope is that Uganda will provide the best proxy for the source of cosmopolitan (non-sub-Saharan) populations, whereas Zambia may be within the region of highest diversity.

We are unlikely to have the capacity to maintain all of these lines, even in single replicates. Therefore, we are quite interested in hearing whether any of you (or others) would like to receive subsets of these population samples. If you are only interested in receiving the lines that are targeted for genome sequencing, please indicate this (we will be maintaining these lines indefinitely). Also please indicate whether you plan to maintain these samples beyond short-term use.

Data from these lines will consist of one haploid genome from each isofemale line. Haploid genomes are obtained by crossing virgin females from the stock of interest to a sterile males of the genotype ms(3)K81/ms(3)K81. Rare embryos which develop extensively as matriclinal haploids, are then individually collected and their DNA amplified. A standard small insert Illumina library is constructed (one from one haploid embryo from each independent isofemale line) and sequenced to >30X.

The above protocol produces haploid genomes without a need for inbreeding or balancer chromosomes. However, we realize that some analyses would benefit from having the closest possible correspondence between the sequence obtained and the alleles present in a living stock. When practical, we have been inbreeding stocks for five generations prior to sequencing. Ideally, inbred stocks could also be PCR-tested for inversion homozygosity. However, we may not have the person-hours available to conduct inbreeding and inversion testing for several hundred stocks. If your research would benefit from genomes sequences from well-inbred living fly stocks, please let us know if you would be willing to help inbreed a subset of these lines.

To recap, please respond and let me know if: (1) there are fly samples you would like to help maintain (2) you would like to assist with inbreeding / inversion testing.

John Pool (jepool(a)ucdavis.edu) Postdoctoral Researcher Drosophila Population Genomics Project UC Davis

jepool@ucdavis.edu

## London LERN EpigeneticsDebate

I would like to draw to your attention to the next LERN (London Evolutionary Research Network, http://-londonevolutionarynetwork.wordpress.com/ ) debate on Epigenetics that will take place in London on the 14th September 2010.

The issue of epigenetics has sparked some discussion about the mechanisms by which evolutionary change arises. Some scientists believe that epigenesis has been an important factor in evolution, and propose a reformulation of the evolutionary theory as we know it, while others do not see epigenesis as a mechanism by which permanent adaptive changes can occur, and thus do not consider the evidence compelling enough to warrant rethinking the tenets of neo-Darwinism.

We at the London Evolutionary Research Network think this is a fascinating topic, and we are pleased to announce our forthcoming debate.

Four eminent speakers in the field will be discussing the motion: “Resuscitating Lamarck: do we need a new evolutionary theory ?”

I would be grateful if you could transmit the information to the EvolDir list.

Thanks a lot in advance,

Best regards,

Alexandra

Alexandra Alvergne, PhD. Human Evolutionary Ecology Group Department of Anthropology University College London 14 Taviton Street London WC1H OBW United Kingdom +44(0)2076798781

http://www.ucl.ac.uk/anthropology/staff/a_alvergne/-index London Evolutionary Research Network/Treasurer http://www.londonevolution.net/ Alex Alvergne <a.alvergne@ucl.ac.uk>

## MasseyU SummerScholarship

The Bio-Protection Research Centre is offering a ten-week Summer Scholarship at Massey University Palmerston North, New Zealand. This research scholarship can be completed at any time between November 2010 and April 2011.

I am searching for a motivated student, either an upper undergraduate (B.Sc., B.Sc. (Hons) or equivalent) or recent graduate (M.Sc. or equivalent), looking to improve their skills in bioinformatics, comparative genomics and next generation sequencing.

The Scholarship will be held over the Southern Hemisphere's summer. As such, this is a great opportunity to extend your research training, while taking advantage of the many travel opportunities that New Zealand has to offer. Palmerston North is close to the North Island's central mountains, with many options for hiking, adventure sports, and experiencing New Zealand's unique culture.

The project on offer is:

Dissecting the regulatory environment of secondary metabolite clusters With Dr Murray Cox, Massey University Palmerston North, New Zealand

This project will determine how gene regulation in secondary metabolite clusters has evolved. Fungal endophytes produce a range of secondary metabolites that help protect their host plants from insects, mammalian grazers and even other fungi. This natural form of biocontrol plays a major role in many agricultural and silvicultural systems in New Zealand and overseas. However, the genetic factors controlling gene regulation in these secondary metabolite pathways are not fully understood. Using recently sequenced genomes of two fungal species (Epichloë festucae and Dothistroma septosporum), as well as high throughput mRNA sequencing data, the successful candidate will explore the role of synteny, conserved promoter/enhancer regions and other regulatory processes in controlling the production of selected secondary metabolite gene clusters.

Note: This project will provide computational biology training for a young scientist. There is no laboratory component, and the scholarship recipient will need advanced computer skills, as s/he will be handling substantial quantities of second generation sequencing data and/or performing comparative analysis of large genomic regions. The recipient will need knowledge of UNIX and basic programming, or willingness and an aptitude to obtain these skills.

Scholarships are for a nominal period of 10 weeks, held anytime between 22 November 2010 and 22 April 2011 (dates are negotiable), have a total value of NZD$5,000 (tax free), and will be awarded on the basis of academic merit. New Zealand citizens and permanent residents are strongly encouraged to apply, but all applications will be considered. Please send a cover letter, CV, and the names of two references to Murray Cox (m.p.cox@massey.ac.nz) by 10 September 2010.

Dr Murray Cox Massey University E m.p.cox@massey.ac.nz T +64-6-356 9099 x2570 W http://massey.genomicus.com murray.p.cox@gmail.com

## MolEvol TeachingResources

The Society for Molecular Biology and Evolution (SMBE) has a new website (smbe.org).

We are interested in posting links to websites that may be useful for researchers and/or teachers of molecular evolution. If you would like SMBE to post a link to such a website, please contact Dr. Dan Graur at smbe.resources@googlemail.com.

In addition to the link itself, please supply a description of at most 140 characters (à la Twitter).

I shall check this email address only periodically, so do not expect a very quick decision on either acceptance or rejection.

Please feel free to forward this email to whoever you think may have an interesting resource for the SMBE

members.

Sincerely

Dan Graur

Councilor SMBE

smbe.resources@googlemail.com

## Outsourcing msat genotyping answers

Thank you all who took the time to respond to my request for information regarding outsourcing microsatellite genotyping. There are a lot of options, and few are identical, so there is a lot to take into consideration when deciding where to go. For ease of use, I'm first listing the companies (and their websites) that were recommended. Below the list will be the actual recommendations, in case anyone is interested in what was actually said about these companies.

Thank you all again.

Ecogenics GmbH www.ecogenics.ch Nevada Genomics Center http://www.ag.unr.edu/genomics/-default.html FADSS http://web.ubc.ca/okanagan/-ikbarberschool/research/analytical/fadss.html University of Arizona Fragment Analysis Facility http://uagc.arl.arizona.edu/index.php/-fragment-analysis.html Alan Wilson Centre http://awcmee.massey.ac.nz/genome-genotyping-main.htm GeneWiz http://www.genewiz.com/-public/micro_sat.aspx The Rockefeller University Genomic Resource Center http://www.rockefeller.edu/-genomics/microsatellite.php University of Maine DNA Sequencing Facility http://www2.umaine.edu/-dnaseq/ Central Michigan University Applied Technology in Conservation Genetics Lab http://-/atcg.bio.cmich.edu/ Georgia Genomic Facility (UGA) http://dna.uga.edu/ BYU DNA Sequencing Center http://dnasc.byu.edu/indexPolicies.asp GENterprise http://www.genterprise.de DNA Analysis Facility on Science Hill at Yale University http://dna-analysis.research.yale.edu/ Complete Answers:

---

we did this for birds at Ecogenics GmbH in Schlieren Zurich. www.ecogenics.ch .Might be inconvenient to send your DNA to Europe, and they are probably not the cheapest, but our experience is very good, and they are fast in general. May be worth to ask for a quote for your specific system, it seems you could set up some mulitplexes which could may it cheaper (they can do that too)..... Good luck, Sjouke

---

I recommend Nevada Genomics Center (http://-www.ag.unr.edu/genomics/default.html). Excellent service, rapid turnover, fast and useful assistance and a reasonable price at ~ $1.90 per sample (see http://-www.ag.unr.edu/genomics/price.html).

My Lab has used their services for 3 years now. Though I am based in NYC, we just drop off PCRs products in the normal mail and it arrives in NV in 3 days usually. So we've had no need for expensive fedexing. Good luck !! Best regards, Else Fjerdingstad

---

You can try FADSS at UBC (http://web.ubc.ca/-okanagan/ikbarberschool/research/analytical/-fadss.html). I have always had good results with them. Cheers, Anders

---

You should look into the University of Arizona's Fragment Analysis Facility:

http://uagc.arl.arizona.edu/index.php/fragment-analysis.html I've used them for several years and have few complaints. They charge $1 per specimen so if you multiplex they can be quite inexpensive. They have a nice user interface on their website too.

---

I doubt it will help as I'm in New Zealand, but we use the Alan Wilson Centre in Palmerston North, New Zealand. I'm sure you'll be able to find some place closer though. Cheers, Roz

---

You may want to look into the New Jersey based company GeneWiz. I spent last year analyzing 50 plates of microsat genotyping. They charge about $100 a plate. We were also pool-plexing, pooling samples with up to 4 different dyes per well. At that level, samples cost about 25 cents a pop. They also have really quick turnaround and will do some free sample work to draw in your business. It's worth a shot. Good luck, John

---

I use the University of Maine sequencing facility for all of my microsatellite genotyping. I believe they use an ABI 3730 (48 capillary). I typically use two different florescent labels (6FAM and HEX with a ROX size standard) so I can load two samples in one well to cut the price in half. Their cost is $75 per 96 well plate and

turn

— / —

This message has been arbitrarily truncated at 5000 characters. To read the entire message look it up at http://life.biology.-mcmaster.ca/˜brian/evoldir.html

## Script for editing alignments

Dear All

Alignment programs like MUSCLE and Clustal often output alignments with "-" symbols indicating indels (real events) within sequence alignments, but also "-" symbols at the 5' and 3' ends of sequences. The latter however, are not real evolutionary events and really should be Ns (missing data), depending on the sort of analytical framework you use.

If there is sufficient heterogeneity and signal within the 5' and 3' ends of sequences, the "-"s can be manually edited in a text editor to Ns with no problem, if the alignment is small. If it is large (e.g. 2000 seqs), or there are lots of alignments, it becomes a lengthy task.

I'm investigating such alignments presently and so was wondering if anyone had a clever way of implementing sed, or had a Perl script that would perform such a task. Simply put, it would require replacing the 5' and 3' "-" below only with Ns and leaving the within sequence "-"s alone. The sequences naturally may span more than one line.

>Taxon 1 ——ATGCTG–TGACTG—-TGACT— >Taxon 2 —GTATGTTG–TGACTGCT–TGACCGTC

to

>Taxon 1 NNNNNATGCTG–TGACTG—-TGACTNNN >Taxon 2 NNNGTATGTTG–TGACTGCT–TGACCGTC

It's a simple task, but I haven't seen any scripts out there to do the job.

If there are any scripters out there who can help, or if someone knows of an application that would help, it would be great to hear from you.

With best wishes and thanks

Si Creer

– Simon Creer Senior Research Fellow Molecular Ecology and Fisheries Genetics Lab Environment Centre Wales Building School of Biological Sciences Bangor University Bangor Gwynedd LL57 2UW UK

e-mail: s.creer@bangor.ac.uk Tel: +1248 382302 Fax: +1248 371644 Home Page: http://-biology.bangor.ac.uk/ ˜ bssa0d/ "Creer,Simon" <s.creer@bangor.ac.uk>

## Script for editing alignments answers

Dear All again

As is customary in Q&A sessions on EvolDir, I am reporting back the gargantuan response to my query below, regarding an expedient way to change TERMINAL ONLY "-" characters to Ns in large or multiple sequence alignments of VARIABLE LENGTH. The initial query is below for reference.

A really big thank you to everyone - it really stimulated a lot of interest and indeed thought on the many ways to skin this particular rabbit. On the GUI front, it became clear that I'm unfamiliar with MacClade, Mesquite and SeaView and will be investigating all soon. A mix of summaries and cut/pastes are below for all to refer to. Some of my alignments are pretty big though and so I am shying away from GUIs and would prefer Perl or Python for these sorts of jobs.

We THINK that sed (Linux) is not powerful enough on its own and so various Python and Perl scripts were donated for testing. The sources and some code (copy, save and make executable chmod +x filename, http://www.linux.org/lessons/beginner/l14/-lesson14b.html) are also pasted below for beta trialling.

I also copy in some thoughts regarding the treatment of gaps and Ns in datasets for consideration.

Many thanks once again to the senders of dozens of responses and best wishes to all once again..

Si

For GUIs, various options were suggested:

MacClade, if you have a Mac and a licence for $125 http://macclade.org/macclade.html Re. your question in evoldir, I think Mesquite will do the job for you (open your alignment and in the menu "Matrix", select "Alter/Transform" and "Terminal Gaps to ?").

Till someone send you a real script, I suggest using

Seaview software for alignment manipulation. http://-pbil.univ-lyon1.fr/software/seaview.html Best wishes, Eszter Ari

PERL Scripts (also check out the BioPerl website http://bioperl.org/: Available from:

Pauline Garnier-Gere pauline@pierroton.inra.fr Francesco Nardi nardifra@unisi.it Olaf Bininda-Emonds olaf.bininda@uni-oldenburg.de seqConverter script for lots of alignment manipulations John Wares Jpwares@uga.edu Charles Kieswetter ckies@bu.edu Nick Crawford ngcrawfo@bu.edu

Some scripts posted below:

Hi Si -

This is pretty straightforward with Bioperl (as long as you have BioPerl installed on your Linux/Unix machine). Here's one solution:

#!/usr/bin/perl -w use strict; use Bio::AlignIO; my $in = Bio::AlignIO->new(-format => 'fasta', -file => shift @ARGV); my $out = Bio::AlignIO->new(-format => 'fasta');

while( my $aln = $in->next_aln ) { for my $seq ( $aln->each_seq ) { my $str = $seq->seq; if( $str =~ /^(-+)/ ) { my $rep = length($1); # replace from the 5' end substr($str,0,$rep,'N'x$rep); } if( $str =~ /(-+)$/ ) { my $rep = length($1); # replace from the 3' end substr($str,-1 * $rep,length($str),'N'x$rep); } $seq->seq($str); } # don't print the /start-end info in the FASTA ID $aln->set_displayname_flat(1); $out->write_aln($aln); }

-jason

Franceso Nardi

#!/usr/bin/perl

use Bio::SeqIO;

if (! $ARGV[0]){ print "\n\nUsage: fillNs.pl /home/../../filename.fasta \n"; print "(..and be careful, this is very basic) \n\n"; } else{ $in = Bio::SeqIO->new( -file => "<$ARGV[0]" , -format => "fasta");

$out = Bio::SeqIO->new( -file => ">$ARGV[0].wNs" , -format => "fasta");

while ( $seq = $in->next_seq() ){ $s=$seq->seq; if ($s =~ m/[^-].*[^-]/){ $s = "N" x length($`)."$&"."N" x length($'); $seq->seq($s); $out->write_seq($seq); } else { die "Sorry, could not find the sequence in ".$seq->id.", quitting...\n\n"; }; }; };

PYTHON Scripts:

Available from:

Nicolas Feau nicolas.feau@bordeaux.inra.fr Eric Fontanillas efontanillas@sb-roscoff.fr

Dear Si,

This was such an easy thing to do in python that I wrote a script to do it in 5 minutes. To run it, just follow the instructions at the top of the script. They should work for a mac and linux (which will come with Python installed), not sure about windows though. I have tried it out on my alignments, and it seems to do the trick, and deals with sequences on >1 line no problem.

I have put the script up on my website (www.robertlanfear.com) where you can download it. Let me know if it does what you want. It would be trivial to extend it to alter all '.fasta' files in a single directory, happy to extend it like that if it would be useful.

Yours

Rob

GAWK solutions:

Hi Simon,

— / —



## SNP screening question

Dear Sir/Madam,

I have just developed around 50 new SNP markers that I would like to test on 1000 samples. Now I am wondering which genotyping system is most suitable for my situation. The system must be reliable und not to expensive. One of the options is also appropriate service that would perform the genotyping.

Can somebody help me with my problem?

Best regards,

Ga[1]per Pustovrh

"Pustovrh, Ga[1]per" <Gasper.Pustovrh@bf.uni-lj.si>

## Software BAli-Phy2 1 0

BAli-Phy ver 2.1.0 ————————

A new version of the software package BAli-Phy is now available. BAli-Phy is a Bayesian MCMC program for estimating phylogenies and sequence alignments jointly from unaligned sequence data. You can download it here: http://www.biomath.ucla.edu/-msuchard/bali-phy/ BAli-Phy is a console program, and is available for - Linux (32-bit and 64-bit) - Mac (32-bit and 64-bit) - Windows (32-bit) - ... and source code. (http://www.biomath.ucla.edu/msuchard/bali-phy/download.php)

New features include: - Allow multiple separate genes as input, - Each gene may have a different substitution model or indel model , - Decrease the amount of RAM used. - Speed up the analysis for many taxa (e.g. $>$ 30). - Auto-detect step sizes in slice sampling. - (more news: http://www.biomath.ucla.edu/-msuchard/bali-phy/news.php)

The updated manual is here: - http://-www.biomath.ucla.edu/msuchard/bali-phy/-help.php#usersguide If you have trouble using bali-phy, please join bali-phy-users@googlegroups.com, and post your questions there. I should be able to get back to you fairly quickly.

take care, Benjamin Redelings

benjamin.redelings@nescent.org

## Software ReleaseofRawGenoVersion2 0-0

Dear Evoldir members,

We announce the release of RawGeno version 2.0-0, an R CRAN library for automating the scoring of AFLPs

This new release includes: - A binning edition device, allowing users to interactively review and modify results obtained with the scoring algorithm. (This is a beta version, so any comments / suggestions are welcome!). - An interactive device for filtering low quality samples. - Enhanced visualization functions for exploring scoring results. - A simplified GUI, that better guides users in their analysis. - Various bug fixes.

In addition, RawGeno is distributed with - A new users manual, with example data. This text was completely rewritten and is far more clear than the previous manual. - An example script showing a complete scoring analysis, using RawGeno with command lines. - A script for optimizing filtering parameters

We hope that will enjoy this version. As usual, any questions / comments / suggestions / bug fixes are welcome.

RawGeno is freely available at: http://-sourceforge.net/projects/rawgeno/files/ Best Nils ARRIGO

Nils Arrigo <nils.arrigo@unine.ch>

## SSE new logo

The Society for the Study of Evolution (SSE) announces a competition for an updated logo. We invite submission of logo designs in electronic format by October 15, 2010. A prize will be awarded for the winning design. See the SSE website (www.evolutionsociety.org) for details.

Judy Stone <jstone@colby.edu>

## BikF Germany MolecularClocks

The Biodiversity and Climate Research Centre (BiK-F) is a new interdisciplinary institute with the mission to carry out internationally outstanding research on the interactions of biodiversity and climate change on the organism level. It has been founded by the Senckenberg Gesellschaft fuer Naturforschung, the Goethe-University Frankfurt am Main, and others partners. The Centre is funded by the Federal State of Hesse through its Initiative for the Development of Scientific and Economic Excellence (LOEWE). It provides a new, dynamic research environment that integrates a variety of disciplines from both natural and social sciences. The Project Area A "Evolution and Climate" invites applications for the position of a Postdoctoral Researcher Molecular Clocks

[Ref. #A29] TV-H E 13 We are looking for a scientist with a strong research focus at the interface of biology, mathematics and informatics, in particular, molecular clocks. The successful applicant will cooperate with various groups of biologists and palaeontologists working on the relation of long-term evolution of climate and plant (and animal) evolution. She or he will be in charge of improving existing and developing new molecular clock approaches, and apply them to different DNA and fossil data sets. The successful applicant will play an active role in the acquisition of external funds and participate in university teaching. Applicants should hold a Ph.D. in biology or in another relevant subject and have a solid publication record. Expertise in the following areas is expected: theory and application of molecular clocks; preference will be given to applicants with additional skills in statistics/mathematics/programming. Excellent written and oral communication skills in English and the interest in joining a multidisciplinary team are required. Salary and benefits are according to a public service position in Germany (TV-H E 13). The Research Centre BiK-F advocates gender equality. Women are therefore strongly encouraged to apply. Equally qualified severely handicapped applicants will be given preference. The contract shall start as soon as possible and will initially be restricted to three years. The duty station will be Frankfurt am Main, Germany. The employer is the Senckenberg Gesellschaft fuer Naturforschung. Please send your application by e-mail attachment, mentioning the reference of this position (#A29) and including a letter outlining your suitability for the position, a detailed CV, contact details of 2 referees and a copy of your PhD certificate before 5 September 2010 to: Prof. Dr. Dr. h.c. V. Mosbrugger, Scientific Coordinator Biodiversity and Climate Research Centre, Senckenberganlage 25, D-60325 Frankfurt am Main, Germany. E-mail to Service and Finances: recruiting@senckenberg.de, and cc to alexandra.muellner@senckenberg.de. For scientific enquiries please write to Prof. Dr. A. Muellner (e-mail: alexandra.muellner@senckenberg.de).

Ursula Maurer <Ursula.Maurer@senckenberg.de>

## HarvardU ComparativeSymbiosis-Transcriptomics

Postdoctoral Fellow Position at Harvard University: Comparative Transcriptomics of Symbiosis**

The Pringle laboratory at Harvard University is looking for a full-time postdoctoral fellow to direct research on the comparative transcriptomics of closely related free-living and symbiotic fungi. The fellowship is funded by the U.S. National Science Foundation for a period of two years.

The Pringle laboratory focuses on the evolution and ecology of fungi, and is broadly interested in the evolution of cooperation and symbiosis, adaptation in the face of global change, and the evolution of the individual. Experiments are directed at understanding phylogeography and evolution of the genus *Amanita*, changing interactions among fungi and plants, and individuality and senescence in a variety of fungal species.

The fellow will work collaboratively with Associate Professor Anne Pringle and graduate student Benjamin Wolfe to grow *Amanita* species both alone and in symbiosis with plants, to extract RNA and create EST libraries, and to use a wide range of bioinformatics techniques to analyze data. Research will coordinate with ongoing sequencing of the *Amanita thiersii* and *Amanita muscaria* genomes. This position requires an independent, organized, and motivated individual with demonstrated skills and experience in molecular techniques and bioinformatics. Above all, we are looking for someone who is personable, motivated and enthusiastic about working in a group environment.

Information about the Pringle laboratory can be found at http://www.oeb.harvard.edu/faculty/pringle/ Informal inquiries can be directed to Anne Pringle at pringle@oeb.harvard.edu.

Formal applications should be made to the administration, by emailing Sutopa Dasgupta at sdagupt@fas.harvard.edu. Please send a letter describing your research interests and experience, a C.V., and contact information for three references.

Applications will be reviewed beginning September 30, 2010 and will be accepted until a suitable candidate is found.

Harvard University is an equal opportunity, affirmative action, non-smoking workplace.

bewolfe@gmail.com

## IfremerUParis6Roscoff GenomicMarinebacteria

Ifremer offers a post-doctoral position for french or foreigners who have completed their PhD.

Duration: 12 months, possibly renewable for 6 months.

Salary(before taxes): 31 680 Euros/years (2640 Euros/months)

Closing date of the call for application: 21 september 2010

Post doc positions will begin from the 1st November 2010

See details at

http://www.ifremer.fr/ds/animation_scientifique/-bourses/postdoctorales/index.html

Subject: Comparative genomic to investigate the molecular mechanisms implicated in marine invertebrate-Vibrio interactions

Principal investigator : Frédérique Le Roux, fleroux@ifremer.fr

Laboratory: Station marine de Roscoff (Université Paris 6-CNRS-Ifremer) Bretagne France

http://www.sb-roscoff.fr/

Abstract

Bacteria of the genus Vibrio represent the predominant culturable, heterotrophic bacteria in marine ecosystems. Of the nearly 80 species described so far, some are pathogenic for humans, while the vast majority is recognized to be a major disease problem in marine invertebrates, notably in mariculture facilities. In this context, our research group aims at investigating the molecular mechanisms involved in the emergence of Vibrio pathogenic for marine invertebrates through an approach integrating molecular epidemiology, virulence mechanisms and genome plasticity as well as host-pathogen interactions. This project is based on in silico approaches (phylogeny, comparative genomic analyses) combined to in vivo (functional genomic) and in vitro studies (experimental challenges).

The main goal of this postdoctoral fellowship is to iden-

tify, using bioinformatics, the molecular mechanisms involved in adaptation of vibrios to their hosts. This will be done through characterization of the different gene families within these genomes as well as gene classification according to their distribution, function and origin. Finally, this work will aim at investigating the evolution of specific genes to decipher putative relationships with the species/strain biology, and at characterizing mobile genetic elements implicated in virulence.

Key words: comparative genomic, phylogeny, evolution, Vibrio, pathogen, marine invertebrates.

Competences

Computer analyst with good background in microbiology, if possible prokaryote.

fleroux2007@yahoo.fr

## ImperialCollege London 2 BioinformaticsSpeciationGenomics

2 Postdocs Research Associates in Bioinformatics & Speciation Genomics

Imperial College London

Salary £30,680 - £39,130 per annum

All appointments will normally be made at the bottom of the salary range

Silwood Park Campus

This is an exciting opportunity for two Research Associates with an interest in Evolutionary Genomics, Next-Generation Bioinformatics and Speciation Research. The successful candidates will carry out cutting edge research investigating the mechanisms of speciation using next-generation sequencing technologies on plant and animal systems on islands (including - but not restricted to - the palms of Lord Howe Island, Australia, see Nature 441:210).

The successful candidates must possess a PhD or equivalent qualification in evolution, ecology, genetics or a closely related discipline. You will have a solid background in either (i) bioinformatic processing of next-generation data for genome assembly, and/or (ii) speciation genetics and genomics. Both candidates should have a strong interest in evolutionary biology.

The successful candidates must also be proficient in statistics, have advanced knowledge of either speciation biology or genome assembly, and in depth experience of working in bioinformatics/genomics. Experience of working in a multi-disciplinary environment, a good track record of academic publications, and experience of management and analysis of complex bioinformatic and genomic data are essential.

The posts are funded for up to 3 years by the European Research Council and will be based at the Silwood Park Campus. The successful candidates will work closely with Prof. Vincent Savolainen (holder of the ERC Advanced Grant) and his research group.

Further details of the research group can be obtained from the research group website: http://www3.imperial.ac.uk/people/v.savolainen Informal enquiries should be addressed to Professor Vincent Savolainen (v.savolainen@imperial.ac.uk) or Ms Diana Anderson (d.anderson@imperial.ac.uk).

Committed to equality and valuing diversity. We are also an Athena Silver SWAN Award winner and a Stonewall Diversity Champion.

Closing Date

20 September 2010 (midnight GMT/BST)

How To Apply

Click the following link: https://www4.ad.ic.ac.uk/-OA_HTML/OA.jsp?akRegionCode=-IRC_VIS_VAC_DISPLAY_PAGE&akRegionApplicationId=800&transactionid=691375908&retainAM=-Y&addBreadCrumb=S&p_svid=19798&p_spid=-998023&oapc=7&oas=5PO9dhL7aCiFd5X61Ru9eQ. . Or following the relevant links 'employment opportunities', then 'job search' on Imperial College London's website

Prof. Vincent Savolainen Imperial College London & Royal Botanic Gardens Kew Silwood Park Campus, Buckhurst Road SL5 7PY Ascot, Berks, UK Tel: +44 (0)20 7594 2374 Fax: +44 (0)20 7594 2339 v.savolainen@imperial.ac.uk www.savolainenlab.org www3.imperial.ac.uk/people/v.savolainen

"Savolainen, Vincent" <v.savolainen@imperial.ac.uk>

## ImperialCollegeLondon MosquitoPopulationGenomics

Postdoc in Anopheles population genomics.

A Research Assistant/Associate position is available

in the lab of Austin Burt for population genomic analyses of the malaria vector Anopheles gambiae s.l. The post will involve analyses of population genomic datasets from full genome shotgun sequencing. The position is funded by the FNIH through the Gates Grand Challenges in Global Health initiative and by the European Commission INFRAVEC project, and you will be a member of both these multi-disciplinary, multi-national teams developing genetic approaches to vector control. (For more detail, see http://-www.grandchallenges.org/ControlInsect/Challenges/-GeneticStrategy/Pages/EndonucleaseGenes.aspx and http://www.infravec.eu/). The research topics to be addressed include patterns of gene flow across the genome both among different geographical locales and between molecular forms and subspecies in the same locale. Time series analyses will also be explored. The emphasis of the post will be on data analysis rather than data generation.

The post will be based in the Ecology and Evolution section at the Silwood Park campus of Imperial College London (http://www3.imperial.ac.uk/-silwoodparkcampus ). It is a fixed-term position, available immediately until 31 August 2013. Salary £26,720 - £38,930 per annum depending upon experience.

Candidates should hold a PhD degree (or equivalent level of qualification) in population genetics, evolutionary genetics, or a related field. You should have experience in molecular population genetic analyses, in dealing with large genetic datasets and/or data from modern sequencing machines, and with some form of programming. A willingness to work effectively and flexibly within a multi- disciplinary team and to exercise initiative and judgment in carrying out research tasks are essential.

Informal enquiries should be addressed to Professor Austin Burt (a.burt@imperial.ac.uk ).

Our preferred method of application is online via https://www4.ad.ic.ac.uk/-OA_HTML/OA.jsp?akRegionCode=-3DIRC_VIS_VAC_DISPLAY_PAGE&akRegionApplicationId=-800&transactionid=1289525897&retainAM=-Y&addBreadCrumb=S&p_svid=18955&p_spid=-960020&oapc=7&oas=FtLmGyXp4mJr52sfy0vm7A . Alternatively, contact Diana Anderson at +44 20 7594 2207 or email d.anderson@imperial.ac.uk

Closing Date: 31 August 2010

---

Austin Burt Imperial College at Silwood Park Ascot, Berks., SL5 7PY, UK
a.burt@imperial.ac.uk

## MNHN Paris HumanPopulationHistory 2

This position was recently announced. However, we have learned since then that the restriction in the number of years after the PhD does not apply anymore, so everybody is welcome to apply. The new deadline is September 15th.

Proposal for a PostDoctoral position Supervisors: Evelyne Heyer and Frédéric Austerlitz UMR 7206 Eco-anthropologie CNRS/MNHN/Université Paris 7 Equipe "génétique des populations humaines" Muséum National d'Histoire Naturelle, Paris, France http://www.ecoanthropologie.cnrs.fr/-spip.php?article300 http://www.ese.u-psud.fr/-pages_perso/spip.php?article18 Inferring the history of human populations using genetic data. Link with environmental changes.

DNA polymorphism data allow the inference of some aspects of the history of human populations. Various methods have been developed, in particular coalescent-based methods, which allow detecting demographic processes, such as migration or population growth and inferring their chronology, using genetic polymorphism within DNA sequences, SNPs and microsatellites. Other methods based on linkage disequilibrium can bring complementary knowledge on these events, allowing in particular the inference of more recent events. These methods include likelihood method and Bayesian methods, in particular the recently developed Approximate Bayesian Computation methods.

The aim of this PostDoctoral position will be to develop and apply these methods to human populations living under contrasting life styles: hunter-gatherers, pastoral nomads, sedentary farmers... The postdoctoral fellow may work in collaboration with a PhD student on this subject. The aim will be to assess whether these populations underwent demographic events, and also the timing of such events in order to assess if they are linked with environmental changes. The available data for this study will be DNA polymorphism data available in public databases, as well as data sets already available or under development within our laboratory. These data sets concern populations of pastoral nomads and farmers from Central Asia, as well as those from hunter-gatherer (pygmies) and farmers from Central Africa,

two regions that went through strong climatic changes during the past millennia.

The candidate should have a strong background in population genetics, in particular on theoretical questions, and on data analysis. Some experience in bioinformatics is required. For any additional information, please contact Evelyne Heyer (heyer@mnhn.fr) or Frederic Austerlitz (frederic.austerlitz@u-psud.fr).

The Postdoctoral position is funded for one year by the French CNRS. Net salary should be between 2000EUR and 2350EUR, depending on experience. Potential candidates should send us by email a CV, three references and a letter of motivation. The deadline for application is September 15st 2010. The successful candidate will start the position no later than December 1st 2010.

frederic.austerlitz@u-psud.fr

## Montpellier EvolutionaryBiology

Postdoc in Evolutionary Community Ecology and Experimental Evolution, Montpellier, France.

A postdoctoral contract of 24 months starting from January 2011 (earlier appointment is negotiable) and funded by the French National Research Agency (ANR) is available in the Â≪ Evolutionary Community Ecology Â≫ group headed by Nicolas Mouquet at the Institute of Evolutionary Sciences of Montpellier (University of Montpellier, France).

The role: The successful appointee will undertake innovative research related to mecanisms of evolutionary diversification and emerging community properties using bacteria as a model system. The main objective is to understand how evolution on simple and complex environments alters the relationship between species richness and ecosystem functioning. His work will be done in close collaboration with theoreticians and can also include modeling if the applicant wants to develop both experimental and theoretical approaches. The research will be supervised by Nicolas Mouquet and will benefit of technical helps.

The person: Applicants should possess a PhD in the area of ecology, evolutionary ecology, or microbial ecology/evolution. A strong background in conceptual ecology/evolution in needed. Experience with ecological microcosms and bacterial evolution will be appreciated. Candidates should have a working knowledge of English, good communication, teamwork and organizational skills as well as to be able to work independently.

The team: Our group associate theoretical and experimental approaches to understand the dynamics of species diversity over short (ecological) and long (evolutionary) time scales. Our approaches are multidisciplinary, mixing community and ecosystem ecology, biogeography, evolution, microbiology, conservation biology and modeling of complex systems. We use different techniques and biological material : (1) mathematical modeling, (2) experimental evolution (with two systems : Pseudomonas fluorescens SBW25 and its phage Phy2 and the protozoan Paramecium caudatum and its bacterial parasite Holospora undulata), (3) data analyses on large-scale species distribution datasets (Birds, Fishes, Rodents and their parasites) and (4) fields studies on tropical fishes Monogenea and marine bacteria. Our team hosts 7 permanent researchers (Vincent Devictor, Michael Hochberg, Oliver Kaltz, Sonia Kefi, Serge Morand, Nicolas Mouquet and Antoine Pariselle) one permanent Technician, several postdocs, Phd and master students.

The department: The Institute of Evolutionary Sciences of Montpellier (ISEM) is one of the strongest French institutes in the field of biodiversity. It hosts 63 permanent researchers (plus 92 technicians, engineers, post-docs and PhD), and encompasses every aspect of evolutionary biology: paleontology, systematics, phylogeny, population genetics, ecology and conservation biology. ISEM belongs to University Montpellier 2, and is deeply involved into teaching, from master to doctorate.

Remuneration: The net salary will be of at least 1800 euros including social security and medical assistance depending on the candidate experience. This is a full-time, fixed term appointment for 24 months.

Contact/Application: This job will remain open until the position is filled, but applicants are encouraged to apply by October 1, 2010. To discuss the role and/or send application contact Dr. Nicolas Mouquet nmouquet@univ-montp2.fr

Application materials should include: (1) Cover letter summarizing interests and qualifications. (2) Resume/Vita. (3) Names and contact information of at least two professional references

Nicolas Mouquet

Institut des Sciences de lâEvolution - CNRS UMR 5554 - UniversitÃ© de Montpellier II - CC 065 34095 MONTPELLIER Cedex 05

nmouquet@univ-montp2.fr Tel +33 4 67 14 93 57 Fax +33 4 67 14 40 61 Skype : nmouquet

http://nicolasmouquet.free.fr/ Nicolas Mouquet <nmouquet@univ-montp2.fr>

## NorthCarolinaStateU PlantSystematicsEvolution

Postdoc: Evolutionary developmental genetics of inflorescence architecture in Dogwoods

We are looking for a scientist who is interested in evolutionary developmental genetics of plant morphology. The position is available at the North Carolina State University, Raleigh, NC, USA and funded by the National Science Foundation for 2-4 years. It is open until filled.

A PhD in plant genetics, evolutionary development or molecular systematics is required, ideally with experience in working with flowering plants in the interface of the three areas. Experimental skills in plant genetic transformation, RNA in-situ hybridization, RT-PCR or qRT-PCR, and phylogenetics are desired. Excellent written and oral communication skills in English and the interest in joining a multidisciplinary team are expected. The postdoc will be working with a team of three faculty members in the Department of Plant Biology and Department of Genetics at NCSU.

The salary is $32,000-35,000 depending on experiences. Women and applicants in minority categories are encouraged to apply. Please send application by e-mail attachment to jenny_xiang@ncsu.edu including a letter outlining your suitability for the position, a detailed CV, and contact details of 3 referees.

Jenny Xiang

Qiu-Yun (Jenny) Xiang, Ph.D. Associate Professor Department of Plant Biology North Carolina State University Gardner Hall 2115 Raleigh, NC 27695-7612 USA Phone: 919-515-2728 Fax: 919-515-3436 Homepage: http://www4.ncsu.edu/ ~ qyxiang Jenny Xiang <jenny_xiang@ncsu.edu>

## OxfordU GenomeEvolution

Two post doctoral positions are available in comparative evolutionary genomics and transcriptomics. Both posts are for up to 5 years (24 months in the first instances, renewable for up to 36 additional months), and are funded by an ERC grant to Dr. Judith Mank at the Department of Zoology at Oxford University to study the genomic and transcriptomic basis of sexual dimorphism in birds. The project will utilize next-generation sequencing (RNA-seq) in a range of bird species to study the ways that sex-specific selection pressures shape the gene expression and gene sequence, and how sexually dimorphic phenotypes are encoded within the genome. The project will be carried out in the state-of-the-art molecular genomics laboratory of the PI, which is part of the Edward Grey Institute (http://www.zoo.ox.ac.uk/egi/-index.htm) within the Department of Zoology (http://-www.zoo.ox.ac.uk/). In addition to the specific responsibilities of the posts, the successful candidates will be encouraged to develop their own research interests in line with those of the PI and other members of the research group. The posts will begin on 4 January, or as soon as possible thereafter. Informal enquiries, with CV, can be sent to judith.mank@zoo.ox.ac.uk. To apply, please see the full advertisements at http://-www.zoo.ox.ac.uk/jobs/index.htm . Postdoctoral Research Assistant - Comparative Molecular Evolutionary Genomics and Gene Expression Reference number AT10024

(1) Evolution of gene sequence and gene expression The primary goal of the project is combine data on expression and coding divergence of sex-biased genes in order to develop a complete picture of how sex-specific selection pressures, arising from different mating systems, shape gene sequence and transcription patterns, and how these contribute to the evolution of sexually dimorphic phenotypes. The successful candidate will use comparative transcriptomic and genomic methods, including divergence estimates, polymorphism studies, and comparative phylogenetics, to identify signatures of selection on sets of genes that contribute to sexual dimorphism.

(2) The evolution of the avian sex chromosomes The project will answer many questions regarding the evolutionary forces shaping Z chromosome expression and divergence, including: 1) the relative importance of positive selection and genetic drift in Faster-X (Faster-Z for birds) Evolution; 2) the magnitude of sexual antagonism and its relative affect on the Z chromosome evolution; 3) the evolution of avian Z chromosome dosage compensation. The successful candidate will incorporate models of sexual conflict and sex chromosome evolution with comparative genomic and transcriptomic data to address these issues.

Selection criteria: Essential: (1) A doctorate in evo-

lutionary biology, genetics, or a related subject. (2) Proven skills in the analysis of whole-genome sequence and/or expression data, with associated bioinformatic abilities. (3) Proven experience in the writing and publishing of data, as evidenced by the publication as first author of at least one primary research paper. Desirable: (1) Wet-lab experience with molecular genetic techniques including DNA and RNA preparation, Sanger sequencing, real-time PCR, and fragment amplification. (2) Research skills in sex chromosome evolution.

Postdoctoral Research Assistant V Bioinformatics and comparative genomics Reference number AT10023

(1) The evolution of gene sequence and gene expression in next-generation sequencing data The primary goal of the project is combine data on expression and coding divergence of sex-biased genes in order to develop a complete picture of how sex-specific selection pressures, arising from different mating systems, shape gene sequence and transcription patterns, and how these contribute to the evolution of sexually dimorphic phenotypes. The successful candidate will use bioinformatic methods to measure gene expression from next-generation (RNA-seq) data in five species of birds. The post-holder will also be responsible for building an accessible database of gene expression and sequence data generated by this and other related projects within the research group.

(2) The evolution of alternate splicing Alternate splicing has been documented between males and females in several species, and represents an important mechanism for the evolution of sexually dimorphic phenotypes. Identifying sex-specific patterns of alternate splicing will give insight into the different methods by which the sexes deploy their shared genome, and can be used with evolutionary divergence data to identify how sex-specific selection pressures act on sexually dimorphic splicing variants. The successful candidate will use

— / —

This message has been arbitrarily truncated at 5000 characters. To read the entire message look it up at http://life.biology.mcmaster.ca/~brian/evoldir.html

## Paris MolPopulationGenetics

A post-doctorate position in molecular population genetics is open in Paris (in UMR 7205 CNRS-MNHN-EPHE) . Research project : molecular population genetics in several Drosophila species from the melanogaster subgroup (D. teissieri, D. yakuba, D. erecta), in order to link patterns of DNA polymorphisms with the history of the African rain forest during the last ten thousand years. The research is supported by Agence Nationale de la Recherche (ANR) The position includes teaching population genetics to Master's students (30 h/y). The position will be open for one year, beginning the 1 September 2010. It can be renewed a second year. Applicants are invited to send a CV to Michel Veuille (veuille@mnhn.fr) by the 15 August.

Michel Veuille <veuille@mnhn.fr>

## Ploen Germany EvolutionaryTheory

In the Evolutionary Theory Group at the Max-Planck Institute for Evolutionary Biology in Ploen (Germany), we have several openings (2-3 years) for

Postdoctoral Researchers

Specific research projects are flexible and can be adjusted to the interests of the applicant, but should fall into the broad area of evolutionary theory. So far, our main research interests range from evolutionary game theory to the evolutionary dynamics of blood disorders, but also include population genetics and cultural evolution.

Requirements for the position include a record of self-motivated research (supported by peer-reviewed publications), a PhD in theoretical biology, applied mathematics, theoretical physics or a related area, excellent analytical and numerical skills and a strong interest in evolutionary biology.

The postdoctoral fellowships provide a competitive annual stipend. Start date and term are negotiable. Highly motivated applicants of any nationality are encouraged to email (i) a statement of research interests (ii) CV and (iii) two letters of reference to traulsen@evolbio.mpg.de . Screening of applications will start on August 30th.

The Max-Planck Institute for Evolutionary Biology is located in Ploen, a small town in a beautiful lake area with all the amenities of a touristically active region. The Baltic Sea and the major university cities Kiel and Lübeck are only 30 minutes away. The working lan-

guage at the institute is English.

The Max-Planck-Society is an equal opportunity employer, and is very interested in raising the proportion of women in areas they are underrepresented. Thus applications from female scientists are especially encouraged.

Arne Traulsen <traulsen@evolbio.mpg.de>

## Tallahassee Florida CoralEvolution

Hi All,

I have an opening in my lab for a combination postdoc/lab tech position to work on genetics of deep-sea corals. The position could begin as early as Sept 1 and goes through May 6 with the possibility of a second full year. Candidates must have already completed their PhD.

Required experience: DNA/RNA extraction, PCR and sequencing Fluency in phylogenetics and/or population genetics software Excellent writing skills Willingness to help train graduate and undergrad students in basic lab methods Willingness to participate in field work (including travel of lengths as long 4 weeks or more) Excellent data management skills

Preferred Experience: Experience with octocorals and/or deep-sea corals Experience with bioinformatics

If interested, please send a CV, 1 page describing research experience, and names of 3 refs.

Thank you for forwarding to interested parties, Amy

–

Amy Baco-Taylor, PhD EOAS/Oceanography 117 N. Woodward Avenue P.O. Box 3064320 Tallahassee, FL 32306-4320

Phone: (850) 645-1547 Fax: (850) 644-2581

PLEASE NOTE NEW EMAIL: abacotaylor@fsu.edu

Amy Baco-Taylor <abacotaylor@fsu.edu>

## TexasAMU MolPopulationGenetics

POSTDOCTORAL RESEARCH SCIENTIST - MOLECULAR POPULATION GENETICS/ECOLOGY

Department of Wildlife and Fisheries Sciences Texas A&M University College Station, Texas 77843-2258

Responsibilities: Position responsibilities involve development and assay of nuclear-encoded microsatellites and of mitochondrial DNA sequences for projects involving population genetics and molecular ecology of marine fishes. Primary responsibilities include data acquisition and analysis, and preparation of reports and publications.

Qualifications: Dissertation or postdoctoral work in molecular population genetics and/or molecular ecology is required, as is experience with microsatellite and/or mtDNA data acquisition and analysis. Experience with major software programs (e.g., ARLEQUIN, GENEPOP, MIGRATE, LDNE, etc.) also is required.

Salary: Salary range is from $32,000 - $38,000/year and will depend on experience. Benefits include health care and retirement. Position is for 12-24 months.

Closing date: Position will remain open until filled.

Contact: Send curriculum vitae, description of research experience, and names, addresses, phone numbers, and e-mail of three references to: Dr. John R. Gold, Department of Wildlife and Fisheries Sciences, Texas A&M University, College Station, Texas 77843-2258. Electronic submissions are acceptable: goldfish@tamu.edu. International applicants will be considered if they hold the correct visa(s). Texas A&M University is an Equal Opportunity/Affirmative Action/Equal Access Employer.

John R. Gold Regents Professor and Senior Faculty Fellow Texas A&M University College Station, Texas 77843-2258 979-847-8778 http://wfscnet.tamu.edu/-gold/gold.html goldfish@tamu.edu

## UArizona PERT

Postdoctoral Positions Available: Research Associate Arizona Research Laboratories, University of Arizona, Tucson, AZ

NIH-Training Program: Postdoctoral Excellence in Research and Teaching (PERT) The Postdoctoral Excellence in Research and Teaching (PERT)

Program is a comprehensive program which offers up to three years of support to outstanding candi-

dates seeking advanced postdoctoral research training, teacher training and student mentorship opportunities in preparation for an academic career in biomedical and life sciences. Funded by NIGMS through an IRACDA (Institutional Research and Career Development Award) training grant, the PERT program also fosters ties between research-intensive institutions and minority-serving institutions.

PERT trainees may select from over thirty-six faculty research mentors at the University of Arizona, representing a broad range of disciplines in biomedicine, bioengineering, genetics, biochemistry, neurobiology, evolutionary biology, molecular/cellular biology, physiology and behavior. The program stresses the use of model organisms for biomedical and life sciences research. The program is administered through the Arizona Research Laboratories Center for Insect Science and is partnered with a Minority Serving Institution, Pima Community College, (http://www.pima.edu/-program/biology/ . Starting salary, based on the NIH NRSA scale, will be $37,368 for program participants with less than one year of postdoctoral experience. An annual allowance for research supplies and travel is also included. Positions are dependent upon continued funding. Additional information about the Center for Insect Science and the PERT program is available at http://cis.arl.arizona.edu/PERT . Qualifications: Applicants must have, as of the beginning date of the appointment, a Ph.D. in a related field from an accredited institution and must be U.S. citizens, permanent residents, or non-citizen nationals. Applicants should have no more than two previous years of postdoctoral experience at the time of application. Application: All applicants must apply electronically through the University of Arizona's Career Track website at: https://-www.uacareertrack.com, citing Job #44851. Deadline for receipt of applications is Friday, October 1, 2010.

All applications are to include:

– a letter of interest with a statement explaining how the PERT program will assist the applicant in his/her research and career goals. – a CV – a three to six page research proposal developed with the intended PERT faculty research mentor describing the project to be undertaken during the training period – three letters of reference – a letter of support from the intended faculty research mentor

Potential applicants are encouraged to contact relevant Program Faculty as soon as possible to discuss research projects and the application process. Original letters of reference and the letter from the proposed faculty research mentor should be mailed to: PERT, Center for Insect Science, 1007 E. Lowell Street, University of Arizona, Tucson, AZ 85721-0106. Emailed letters will be accepted only if accompanied by an electronic signature. The letter of interest, CV and research proposal must be submitted online through the UA Career Track website listed above. As an equal opportunity and affirmative action employer, the University of Arizona recognizes the power of a diverse community and encourages applications from individuals with varied experiences and backgrounds. Please contact Teresa Kudrna for more information, tkudrna@email.arizona.edu, 520-621-9310.

Teresa Kudrna Program Coordinator, Sr. PERT Program Center for Insect Science 1007 E. Lowell Street, Room 227 Tucson, AZ 85721 Telephone: 520-621-4923 Fax: 520-621-2590 Email: tkudrna@email.arizona.edu

Teresa Kudrna <tkudrna@email.arizona.edu>

## UBuffalo PolarBearEvolution

Postdoctoral fellowship: Polar Bear Evolution

Postdoctoral fellowship available immediately at the University at Buffalo for up to 2 years to study polar bear evolution using next-generation sequencing and population genetic methods. The project will employ ancient DNA (see Lindqvist et al., PNAS 2010) and modern polar and brown bear material. Fellowship will require considerable bioinformatic skills, including, e.g., PERL, PYTHON, Java, C++ programming, and population genetics theory and practice. Experience with transcriptomic analysis and SNP detection in any system preferred, as well as some molecular wet lab background. The research is in collaboration with Stephan Schuster at Penn State University, Sandra Talbot at USGS, and Øystein Wiig and Lutz Bachmann at the University of Oslo.

Please send CV with 3 references indicated and a cover letter describing your background and reasons for interest in this particular study. The position will remain open until filled.

Charlotte Lindqvist, Department of Biological Sciences, University at Buffalo, Email: cl243@buffalo.edu

Charlotte Lindqvist <cl243@buffalo.edu>

## UBuffalo PolarBearEvolution 2

*Postdoctoral fellowship: Polar Bear Evolution*

Postdoctoral fellowship available at the University at Buffalo for up to 2 years to study polar bear evolution using high-throughput next-generation sequencing and population genetic and molecular evolutionary methods to detect, e.g., selective sweeps and positive Darwinian selection.

The project will employ ancient DNA (see Lindqvist et al., 2010, PNAS 107: 5053-7) and modern polar and brown bear material. Fellowship will require bioinformatic skills, e.g. PERL, PYTHON, Java, and/or C++ programming, as well as population genetic and molecular evolutionary theory and practice. Experience with transcriptome analysis and SNP detection in any system preferred, as well as molecular wet lab background.

The research is in collaboration with Stephan Schuster at Penn State University, Sandra Talbot at USGS, and Øystein Wiig and Lutz Bachmann at the University of Oslo.

Please send CV with 3 references indicated and a cover letter describing your background and reasons for interest in this particular study. The position will remain open until filled.

Charlotte Lindqvist, Department of Biological Sciences, University at Buffalo, Email: cl243@buffalo.edu <mailto:cl243@buffalo.edu>

– Charlotte Lindqvist, PhD Department of Biological Sciences University at Buffalo (SUNY) Buffalo, NY 14260 716-881-8216 (CoE) 716-645-4986 (North Campus) 716-645-2975 (fax) cl243@buffalo.edu

Charlotte Lindqvist <cl243@buffalo.edu>

## UChicago 2 PopulationGenetics

Postdoc positions, University of Chicago

Two postdoctoral positions are available in Molly Przeworski's lab at the University of Chicago. Current work in the group focuses on a wide range of topics in primate evolution and population genetics; for more information, see http://przeworski.uchicago.edu/. The successful candidates can focus on whichever topic they find of most interest.

The group shares space and weekly lab meetings with those of Jonathan Pritchard and Matthew Stephens and enjoys close ties with other members of the Human Genetics and Ecology & Evolution departments, notably Anna Di Rienzo, Dick Hudson and Carole Ober. Moreover, it benefits from the large and outstanding community of researchers in population genetics, statistics and genomics at the University of Chicago.

Applicants for the position must have either a background in theoretical population genetics, with experience in data analysis, or come from a quantitative field (such as statistics or computer science) and have a strong interest in genetics and evolution. Strong programming and bioinformatics skills are essential. Informal inquiries as well as applications (including a CV, copies of relevant publications and two letters of recommendation) should be emailed to Molly Przeworski at mfp@uchicago.edu. The starting date is negotiable but could be as early as fall 2010.

Molly Przeworski Howard Hughes Medical Institute Early Career Scientist Dept. of Ecology & Evolution and Dept. of Human Genetics University of Chicago

molly.przew@gmail.com

## UCSB TranscriptomeEvolution

*Postdoctoral Position - UCSB Transcriptome Evolution*

The Oakley Lab at the University of California-Santa Barbara seeks a highly motivated and productive postdoctoral researcher to work on NSF-funded research to characterize genes involved in invertebrate vision and eye development. We are targeting for next-generation sequencing traditionally 'non-genomic' organisms with rich histories of studies on eye/vision physiology, evolution, and development.

The position requires an individual with a PhD and experience in molecular evolution, evo-devo, phylogenetics, visual or neurophysiology, or related fields. Outstanding molecular, computational and/or quantitative skills are particularly advantageous.

Funding is available for a 12-month position, for a min-

imum of 1 year, and may be extended upon mutual agreement. Preference will be given to candidates with a high probability of applying for (with the help of the PI) and obtaining independent funding; for example through the University of California President's Postdoctoral Fellowship, NIH-NRSA fellowship, NSF Postdoctoral fellowships, or other funding agencies.

The successful candidate will be expected to interface with multiple collaborators who are experts on target taxa, to co-ordinate next-generation sequencing, and to perform initial bioinformatic analyses on the data. The candidate will be expected to become an integral member of an interactive and collaborative lab group, and to supervise and/or mentor students. There will be ample opportunity for the candidate to pursue his or her own research program within the context of the grant proposal, and in collaboration with the PI, lab, and outside collaborators.

The starting date can be immediate, and the position will remain open until filled. For primary consideration, applicants should apply by September 15, 2010. Informal inquiries are welcomed, prior to formal application. To formally apply, please send the following:

1. A curriculum vitae 2. Names of 3 referees willing to provide a letter of recommendation upon request 3. A brief statement of how your research goals fit with research on the evolution of vision transcriptomes 4. A brief statement of interest, ideas, and qualifications for independent fellowship and/or grant applications

E-mail applications are preferred: oakley@lifesci.ucsb.edu <mailto:oakley@lifesci.ucsb.edu>

Mailed applications are also acceptable to: Todd Oakley Ecology Evolution Marine Biology University of California- Santa Barbara Santa Barbara, CA 93106

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

Todd H. Oakley Professor Ecology Evolution and Marine Biology University of California-Santa Barbara Santa Barbara, CA 93106 (805) 893-4715 http://www.lifesci.ucsb.edu/eemb/labs/oakley/ todd.oakley@lifesci.ucsb.edu

## UGeorgia NetworkPopulationDynamics

POSTDOCTORAL ASSOCIATE IN POPULATION DYNAMICS ON NETWORKS

A *Postdoctoral Associate* is sought to join a collaborative project between the University of Georgia (Dr. John Drake) and the University of Michigan (Dr. Pejman Rohani) on dynamics of metapopulations on geographic networks. Goals of this project are to characterize the effects of targeted and systematic interventions on the dynamics of populations distributed on networks. Applications include epidemic forecasting, control of invasive species, and conservation and management of natural resource systems. The position will be located in the Drake lab at the University of Georgia Odum School of Ecology with a starting salary of $41,715. Start date is negotiable. Applicants should have a background in population ecology, dynamical systems, network theory or a related field. Inquiries may be communicated by email. Applicants are requested to send a letter of introduction and CV and to arrange for three letters of recommendation to be sent to jdrake@uga.edu. Review of applications will continue until the position is filled.

andrea.silletti@gmail.com

## UGeorgia PopDynamicsInfectiousDiseases

POSTDOCTORAL ASSOCIATE IN DYNAMICS OF COMPLEX SYSTEMS: TIPPING POINTS IN DISEASE CONTROL

A *Postdoctoral Associate* is sought to join a collaborative project between the University of Georgia (Dr. John Drake) and the University of Michigan (Dr. Pejman Rohani) on the population dynamics of infectious diseases. Goals of this project are to understand the effect of vaccination on the bifurcation structure of endemic pathogen systems and to document tipping points in disease dynamics. The position will be located in the Drake lab at the University of Georgia Odum School of Ecology with a starting salary of $41,715. Start date is negotiable. Applicants should have a background in dynamical systems, statistical mechanics, biomathematics, biostatistics or a related field. Inquiries may be communicated by email. Applicants are requested to send a letter of introduction and CV and to arrange for three letters of recommendation to be sent to jdrake@uga.edu. Review of applications will continue until the position is filled.

andrea.silletti@gmail.com

## UGeorgia ViralEvolution

POSTDOC POSITIONS Opportunities are available for two postdoctoral research associates to study the molecular dynamics of HIV and other viruses. The ideal applicants should have Ph.D. in molecular biology, bioinformatics, or applied mathematics with less than five years of postdoctoral experience. Extensive experience with high-throughput sequence analysis and modeling, data mining, Perl/CGI, R, and MySQL is desirable. The position will be funded for 2 years with possible extension. To assure consideration, complete applications should be received by September 15, 2010. Applications will be entertained until the two positions are filled. The tentative start date is anytime after November 1, 2010. Please send the curriculum vitae, brief statement of research interests and names of three references to:

Dr. Ming Zhang Department of Epidemiology and Biostatistics Faculty of Infectious Diseases University of Georgia Athens, GA 30602 mingzh@lanl.gov or, c/o Dustin Baker jambaker@uga.edu

Ming Zhang <mingzh@lanl.gov>

## UHawaii AstrobiologyBioinformatics

The Institute for Astronomy (IfA) invites applications for a postdoctoral fellowship in evolutionary bioinformatics to work with the University of Hawai'i's NASA Astrobiology Institute team (see http://www.ifa.hawaii.edu/UHNAI/).

We seek an individual to undertake a mentored research program that studies the evolution of genetic coding through analysis of protein folds and their amino acid composition. We require someone with experience in protein fold prediction (protein threading algorithms, homology modeling or alternatives); Experience in automated queries of the SCOP and CATH databases (or equivalents) and a general competence in bioinformatics programming (i.e. scripting languages such as Perl) will be strongly preferred. Experience with XML database development would be ideal.

The Fellowship is for one year and may be renewable for another year assuming satisfactory progress and continued availability of funds. The fellow will receive a stipend of $5,000 per month, a small relocation allowance and basic research costs.

For further details, and application procedure, please see: http://www.ifa.hawaii.edu/UHNAI/-PD_bioinformatics.pdf – Project Manager, University of Hawaii NASA Astrobiology Institute

Room B106 Institute for Astronomy 2680 Woodlawn Drive Honolulu, Hawaii 96822-1839 USA

evolving.man@gmail.com

## UHelsinki AntPopGenetics

Post-doctoral position in Helsinki, Finland

A one-year postdoctoral position with the possibility of an extension (funding pending) is available at the Department of Biosciences, University of Helsinki. Focus will be on colony kin structure and genetic population structure in the ant Formica fusca, with aim to answer questions such as colonization patterns and gene flow in a pioneering species, variation in effective population sizes and the effects of these on colony kin structure and genetic variability. An extensive data set comprising the microsatellite genotypes of workers and resident queens on six populations and over 150 colonies, as well as worker genotype data on four additional populations is available. The post-doc will be expected to take an independent role in processing the data and compiling the results into publications.

The post doc will work in a highly active and integrated academic environment of three collaborating research teams, including faculty, other post docs and PhD students (see links below). The successful applicant will have the opportunity to develop additional questions related to the main research program.

We are looking for a strongly motivated candidate with a PhD in the field of Evolutionary Biology and Ecology. Experience in evolutionary ecology, population genetics, statistics and strong written and oral communication skills are a plus. Salary ranges between 2500-3000 brutto per month and includes benefits (health insurance) which are included in the Finnish system.

Applications will be reviewed starting August 30th un-

til the position is filled. The anticipated start date is January 1st 2011 but is negotiable; the end date is fixed to December 31st 2011 owing to limitations in the funding period.

Applications should be sent to Lotta Sundström (liselotte.sundstrom@helsinki.fi), and include: (1) a cover letter describing your research interests and qualifications, (2) a full CV, (3) contact information (email, phone number) of minimum 2 referees, and (4) pdfs of up to three representative publications. Please include Â≪ postdoctoral applicationÂ≫ in the subject line of the e-mail. Informal inquiries are welcome.

Links:(http://www.helsinki.fi/biosciences/-ecologyandevolutionarybiology/research.htm); http://-www.helsinki.fi/science/ants/Antzz.html)

Liselotte Sundström Professor in evolutionary biology University of Helsinki Department of Biosciences P.O.Box 65, FI-00014 Helsinki. Finland

phone: +358-(0)9 191 57695 fax: +358-(0)9 191 57694 email: liselotte.sundstrom (at) helsinki.fi

web sites: www.helsinki.fi/science/ants liselotte.sundstrom@helsinki.fi

## UIllinois GenomeEvolutionGrasses

A 3-year postdoc is available at the Energy Biosciences Institute at the University of Illinois to study genome evolution in interspecific and intergeneric hybrids of the Saccharinae clade of grasses, which includes sorghum, sugarcane, and Miscanthus. The project involves the identification of parent-specific polymorphisms in hybrids, tracking their changes in copy number and expression through meiotic events, and testing them for association with a suite of developmental and life history traits. Major responsibilities include the design, implementation, and analysis of next-gen sequencing experiments. A PhD in plant biology, genetics, bioinformatics, or evolutionary biology is required. Programming skills and previous experience working with large genetic datasets are desired.

The Energy Biosciences Institute (EBI; www.energybiosciencesinstitute.org) is a multidisciplinary group of over 60 research programs and projects at the University of Illinois and the University of California, Berkeley, devoted to finding biological solutions to global energy challenges, and funded by a 10-year, $500 million grant from the energy company BP. At the University of Illinois, EBI is housed in the Institute for Genomic Biology (IGB; www.igb.illinois.edu), one of the newest buildings on campus, and offers a large, fully-equipped lab space and ample computational infrastructure. Champaign-Urbana is located in east-central Illinois, several hours drive from Chicago, St. Louis, and Indianapolis, with a thriving arts scene, affordable housing, and a family-friendly community.

To apply, please email a CV and statement of research interests to:

Dr. Patrick Brown Assistant Professor Energy Biosciences Institute & Department of Crop Sciences University of Illinois 1408 Institute for Genomic Biology

pjb34@illinois.edu

## UNebraska ViralEvolution

POSTDOC POSITIONS in Viral Evolution

Two postdoctoral research positions in viral evolution and bioinformatics are available in the Nebraska Center for Virology at the University of Nebraska-Lincoln. This Center is one of the premier virology research centers in the US. The candidates will work with Dr Charles Wood. His laboratory uses molecular and genomic approaches to study HIV and Human Herpesvirus 8, a virus linked to Kaposi's Sarcoma, a rare cancer often found in AIDS patients. Ongoing research includes studies on HIV evolution in an African cohort; mother-to-child transmission, disease progression and drug resistance among patients. Specifically, the successful candidate will be responsible for mining next-generation sequence data (454/Illumina platform) and carrying out bioinformatic data analyses. Candidates will also have the opportunity to work with other research projects by different Center faculty studying various, human, animal and plant viruses, which include HIV, herpesviruses, papilloma, influenza, pox and algal viruses.

These positions require highly motivated, enthusiastic and independent individuals. Candidates should have a PhD in evolution, genetics, genomics, bioinformatics, computational biology or a related field. Applicants should have programming experience in a linux environment using perl or other high-level languages and proficiency with relevant software packages for genome assembly, molecular evolution, and phylogenet-

ics. Knowledge and experience with next-generation sequence data is preferred.

Informal inquiries about the projects are encouraged. For more information about the Center please go to www.unl.edu/virologycenter .Applicants should submit a cover letter describing previous experience and fit to the position, full CV and contact information for 3 references. Applications and all queries may be sent to Dr Charles Wood at cwood1@unl.edu

Charles Wood, PhD Director, Nebraska Center for Virology Lewis Lehr/3M University Professor School of Biological Sciences University of Nebraska Rm 102C, Morrison Center, 4240 Fair St Lincoln, NE 68583-0900

Office: 402-472-4550/4570 Lab : 402-472-4559 Fax :402-472-3323

e-mail: cwood1@unl.edu

www.unl.edu/virologycenter cwood1@unl.edu

damientully@gmail.com

## UNewSouthWales EvolutionLifespan

Research Associate Faculty of Science School of Biotechnology and Biomolecular Science REF. 7391NET

Salary Level A: A$71,250 - A$76,209 per year, plus 9% employer superannuation, plus leave loading.

The Research Groups of Professor Bill Ballard in the School of Biotechnology and Biomolecular Sciences (BABS) and Professor Rob Brooks in the School of Biological, Earth and Environmental Sciences at the University of New South Wales, are seeking a Postdoctoral Research Associate to work on a grant funded by the ARC Discovery scheme “Linking the evolutionary and bioenergetic causes of sex differences in lifespan and ageing”, and to undertake other research on bioenergetics and aging in insects.

The successful applicant is expected to do empirical work, analyze data and write papers. Laboratory supervision while Professor Ballard is Head of School is required. The applicant should be prepared to apply for fellowships in coming fellowship rounds, especially the ARC Discovery round in early 2011. Emphasis will be given to the quality of published research in our decision to appoint.

This is a full time (35 hours per week) position, fixed term for 18 months.

Applicants should systematically address the selection criteria in their application.

Having read all the documentation you may then direct any enquiries to Professor Bill Ballard on telephone number (61 2) 9385 2029 or email w.ballard@unsw.edu.au, or to Professor Rob Brooks on (61 2) 9385 2587 or at email rob.brooks@unsw.edu.au

Applications close : 10 September 2010

For more information, application procedures or other vacancies, visit: http://www.hr.unsw.edu.au/-services/recruitment/jobs/13081005.html

Angela Teng Advertising Executive UNSW Marketing Services

The University of New South Wales UNSW SYDNEY NSW 2052 AUSTRALIA t: (+612) 9385 1698 | f: (+612) 9385 8797 e: angela.teng@unsw.edu.au | w: www.unsw.edu.au

CRICOS Provider no. 00098G

Angela Teng <angela.teng@unsw.edu.au>

## UNewSouthWales EvolutionSex

POSTDOCTORAL RESEARCH ASSOCIATE FACULTY OF SCIENCE SCHOOL OF BIOTECHNOLOGY AND BIOMOLECULAR SCIENCES REF

ADVERTISEMENT

Salary Level A: A$6 71,250 - A$76,209 per year (plus 17% employer superannuation and leave loading)

The Research Groups of Professor Bill Ballard in the School of Biotechnology and Biomolecular Sciences (BABS) and Professor Rob Brooks in the School of Biological, Earth and Environmental Sciences at the University of New South Wales, are seeking a Postdoctoral Research Associate to work on a grant funded by the ARC Discovery scheme “Linking the evolutionary and bioenergetic causes of sex differences in lifespan and ageing”, and to undertake other research on bioenergetics and aging in insects.

The successful applicant is expected to do empirical work, analyze data and write papers. Limited laboratory supervision while Professor Ballard is Head of School is required. The applicant should be prepared to apply for fellowships in coming fellowship rounds, es-

pecially the ARC Discovery round in early 2011. Emphasis will be given to the quality of published research in our decision to appoint.

This is a fixed term position for two years.

Applicants should systematically address the selection criteria in their application.

Having read all the documentation you may then direct any enquiries to Bill Ballard on telephone number (61 2) 9385 XXXX or at email w.ballard@unsw.edu.au, or to Rob Brooks on (61 2) 9385 2587 or at email rob.brooks@unsw.edu.au

Applications close 10 September 2010

>From Friday 13 August, this advertisement and details on how to apply will be available at http://www.hr.unsw.edu.au/services/recruitment/-newjobres.html Rob Brooks www.eerc.unsw.edu.au Participate in our new Global study on the evolution of attractiveness www.bodylab. biz

rob.brooks@unsw.edu.au

## USouthCarolina 2 DaphniaEvolution

Two Post-docs: Genetics of Aging in Daphnia

We seek to fill two post-doctoral positions for an interdisciplinary NIH-funded project on the characterization and genetics of aging in Daphnia. As a whole, the project involves the integration of demographic, physiological, genomic, and functional genetic information to understand naturally evolved variation of aging and its response to resource heterogeneity. The project exploits naturally occurring variation among Daphnia ecotypes with different selection pressures on aging and different levels of resource variation. This is a collaborative effort among the labs of PI Dr. Jeff Dudycha (evolutionary ecology and genetics of life history), Dr. Rekha Patel (molecular genetics of stress responses), and Dr. Sean Place (ecophysiological genomics).

Post-Doc #1: Functional genetics (jointly advised by Patel & Dudycha). This position will focus on developing functional genetics techniques in Daphnia, and apply them to genes likely to be involved in aging. We anticipate that this individual will use a variety of techniques, such as yeast two-hybrid assays, cell culture, transgenics and gene knockdown, and epigenetic profiling. Start date for this position is as soon as possible.

Post-Doc #2: Ecological genomics and physiology (jointly advised by Dudycha & Place). This position will focus on A) characterizing gene expression profiles in Daphnia of different ages exposed to different resource levels and B) quantifying age-dependent physiological changes. We anticipate that this individual will use a combination of life tables, gene expression profiling, and phenotypic measures to characterize variation associated with aging.

Qualifications: Candidates for both positions must have a Ph.D. in biology or related field at the start of the appointment. In addition, candidates should be comfortable working in a diverse collaborative environment, should have excellent written and verbal communication skills and strong quantitative skills, and should have an intellectual interest in the project. Candidates for Position 1 should have a strong background in molecular genetics. The ideal candidate will have experience in a range of molecular genetic techniques (e.g., yeast two-hybrids, epigenetics, cell culture, antibody staining), and an interest in advancing functional genetics in a novel model system. Experience with Daphnia or other crustaceans, as well as transgenic construction or gene knockdowns in inbertebrates are assets, but not expected. Candidates for Post-Doc #2 should have a strong background in evolutionary biology, and ideally will have experience with bioinformatics, Daphnia, and/or life history evolution. In addition, preference will be given to candidates with experience in gene expression analysis, invertebrate physiology, and statistical software (R or SAS).

Both positions offer competitive salary and benefits, commensurate with experience, as well as a range of mentoring and professional development opportunities. Review of materials for PD#1 will begin immediately, to start as soon as practical. Review of materials for PD#2 will begin November 1. A start date of May 16, 2011 is preferred for Position 2, but is flexible. Positions will be offered for an initial period of 1 year, and can be renewed for 2 years upon satisfactory performance. To be considered, submit the following materials as a single .pdf file: 1) a cover letter that describes your qualifications for the position, 2) A current CV, 3) Names and contact information for three referees willing to provide a letter of recommendation, 4) a brief statement of your research interests and how they dovetail with our research project. Submit all materials to Dr. Jeff Dudycha via email to dudycha [at] biol [dot] sc [dot] edu. Informal inquiries are welcome.

Additional information about our research programs can be found on our websites: http://-www.biol.sc.edu/ ~ dudycha/ http://www.biol.sc.edu/-faculty/patel-r.html http://www.biol.sc.edu/faculty/-place.html Cheers,

Jeff –

Jeffry L. Dudycha Assistant Professor Dept. of Biological Sciences University of South Carolina Columbia, SC 29208 http://www.biol.sc.edu/~dudycha dudycha [at] biol.sc.edu

## USouthernCalifornia CNVs and RareVariants

POSTDOCTORAL ASSOCIATES TO WORK ON, A) EVOLUTION AND DETECTION OF COPY NUMBER VARIATION, and B) METHODS FOR DETECTION OF ASSOCIATION WITH RARE VARIANTS

The Division of Biostatistics at the University of Southern California seeks a highly motivated individual to work on a recently funded project focusing on copy number variation and rare variants. The project has two main aims. Firstly, the assessment of performance of existing algorithms for CNV detection and the development of new methods for CNV-calling based upon mathematical models for copy number evolution. Secondly, the development of statistical methods for detecting associations between phenotype and rare variants. The project is a collaboration with colleagues at USC's Molecular and Computational Biology group.

Candidates should be ready to start immediately, have a PhD with an appropriate (mathematical) background, and be able to 'hit the ground running'. Salary will be $40-$60K/annum dependent upon experience. The position is for 12 months, starting immediately, and is at the Division of Biostatistics, located at USC Health Sciences Campus, located just east of Downtown Los Angeles.

Interested applicants should send a CV, statement of research interests, and names and contact information for three referees to Dr. Paul Marjoram, USC, Dept. of Preventive Medicine, 1540 Alcazar St., CHP-220, Los Angeles, CA 90033. email: pmarjora@usc.edu

emailed responses are would be preferred.

Paul Marjoram Dept. of Preventive Medicine University of Southern California 1540 Alcazar Street, CHP 220 Los Angeles, CA 90089-9011 USA.

Ph= 323-442-0111 FAX= 323-442-2349

Paul Marjoram <pmarjora@usc.edu>

## UToronto EvolutionRegulatorySequences

A postdoctoral position is available in Alan Moses' lab at the University of Toronto to study evolution of regulatory sequences. The first aim will be to apply evolutionary genomics approaches to analyze regulatory sequences in newly sequenced plant genomes as part of a multi-investigator project (http://biology.mcgill.ca/~vegi/index.html).

Our lab is interested in the evolution of regulatory sequences and networks, and we use computational and statistical techniques from molecular evolution and population genetics. We have ties to the Cell & Systems Biology, Computer Science and Ecology and Evolutionary Biology departments, making our lab a great environment for collaboration with people in other disciplines. You can find out more at http://www.moseslab.csb.utoronto.ca/ Candidates with a strong background in evolutionary or population genetics and experience with genome-scale data analysis would be ideal. Interested candidates should contact Alan Moses by email. Please include a single PDF attachment containing your c.v., a brief description of past research accomplishments and future goals, and the name and e-mail address of 2 potential references. Funding is guaranteed for 1 year, with a second year renewable depending on progress.

The University of Toronto is a large research university in downtown Toronto, a vibrant, multicultural city on the shore of Lake Ontario, with rich cultural options in the arts, music and film, ethnic cuisine, and a high quality of life.

Contact: alan.moses@utoronto.ca

## UTuebingen SpermFunctionEvolution

Dear All,

I have a postdoctoral position available. Please pass it on to interested people. Many thanks, Klaus

Postdoc: UTuebingen - Evolution of sperm function/ physiology

For a postdoc position at the University of Tuebingen (Germany), funded by the VolkswagenStiftung http://www.volkswagenstiftung.de/funding/thematic-impetus/evolutionary-biology.html?L=1, I am looking for a postdoctoral researcher who is interested in (experimental) evolution of sperm physiology/ function/ competitiveness using Drosophila and bedbugs. The position is fixed-term, for ca. three years, available from Nov 2010 or early 2011. A PhD in genetics, evolutionary or reproductive biology or related subjects is required, ideally coupled with experience in working with Drosophila, and in methods of sperm physiology or experimental evolution.

The payment is at TVL E13 (which amounts to anything between 17,500-28,800 EURO annually (after taxes), depending on previous experience, marital status, children and extra insurances). In case of equal quality of applicants, those with disabilities will be preferred. The university of Tuebingen aims to increase the representation of women in research and teaching and therefore encourages female scientists to apply.

Please contact me for further details (k.reinhardt@sheffield.ac.uk) or send me your cv, 2-3 email addresses of references and, if you have, your own two favourite (not necessarily highest-ranked) publications (all in one file), to (k.reinhardt@sheffield.ac.uk). The deadline for applications is 26 Sept 2010.

Tuebingen is a lively town with beautiful surroundings, the biology is ranked as one of the best of German universities. The research group Ecology and Evolution (www.eve.uni-tuebingen.de/) is very (inter)active and includes several research areas within the university and the Max-Planck Institute for Developmental biology (www.eb.tuebingen.mpg.de/). Tuebingen will host the 2011 European biology meeting (ESEB) (http://-www.eseb2011.org/).

Dr Klaus Reinhardt Advanced Fellow - VolkswagenStiftung Visiting Scientist - Dept Animal & Plant Sciences University of Sheffield http:/-/e3.group.shef.ac.uk/people/klaus-reinhardt/
k.reinhardt@sheffield.ac.uk

## UTulsa EvolutionSocialBehavior

Postdoctoral Position in Evolution of Social Behavior

A postdoctoral research associate position is available with Dr. Charles R. Brown at the University of Tulsa to work on analysis of a 30-year mark-recapture data set on cliff swallows. General questions include determining the effects of colony size, philopatry, breeding time, and morphometrics on fitness (annual survival) and movement of birds within a study area containing about 30 capture sites (colonies) each year. The total data set contains over 200,000 individuals and over 350,000 captures and recaptures, and is among the largest such data sets on birds in the world. Candidates should have a Ph.D. and background and training in state-of-the-art (including Bayesian) analysis of mark-recapture data. The position can start by 1 January 2011, and funding is available for up to three years. Some summer field work at the research site in western Nebraska could be incorporated, depending on a candidate's interest.

Tulsa is the second largest city in Oklahoma, with a population of about 700,000 in the greater Tulsa metropolitan area. Located within the cross timbers region of Oklahoma, an ecotone between the eastern forests and the Great Plains, the city is within an hour's drive of the Ozarks to the east and tall grass prairie to the northwest. Tulsa is annually ranked among the more affordable cities in the U.S., and contains the cultural amenities expected of a major metropolitan area.

Persons interested should send a CV and names and contact information for three references to Dr. Charles R. Brown, Department of Biological Sciences, University of Tulsa, 800 S. Tucker Dr., Tulsa, OK. 74104, email: charles-brown@utulsa.edu.

Charles R. Brown Professor Department of Biological Sciences University of Tulsa 800 S. Tucker Dr. Tulsa, OK. 74104 Phone: 918-631-3943 Fax: 918-631-2762 E-mail: charles-brown@utulsa.edu

"Brown, Charles" <charles-brown@utulsa.edu>

## UWisconsin Milwaukee EvolGenomics

Postdoc: University of Wisconsin-Milwaukee Evolutionary Genomics of Hybrid Zones

A postdoctoral position in the evolutionary genomics of hybrid zones is available in the lab of Emily Latch at the University of Wisconsin-Milwaukee. This project investigates the genomic architecture of a stable hybrid zone

between mule deer and black-tailed deer. Specifically, the successful candidate will be responsible for mining next-generation sequence data (exon capture followed by Illumina sequencing), to characterize selected and non-selected SNPs distributed across the genome of mule, black-tailed and hybrid deer. Once loci are identified, they will be used for high-throughput genotyping of spatially referenced deer from across the hybrid zone to characterize the structure and mode of hybrid zone maintenance in this species. Despite a high potential for gene flow in this species, the hybrid zone has remained relatively stable for approximately 8,000 years, parental types have maintained genetic and morphological distinctiveness, and hybrids do not exhibit an apparent reduction in fitness. The complex nature of the mule deer X black-tailed deer hybrid zone presents a unique opportunity to evaluate competing models of hybrid maintenance in the context of genomic and geographic mosaics.

A PhD in evolution, genetics, genomics, bioinformatics, computational biology or similar field is required. Applicants should have demonstrable experience in one or more of the following areas: 1) assembly and annotation of genomes from next-generation sequencing technologies, 2) evaluation of genomic data using tools of molecular evolution and phylogenetics, or 3) computer programming. Annual salary starts at $40,000/year. One year of funding is available, and responsibilities for the first year include collaborating on a grant proposal to fund continued research after the first year.

Informal inquiries about the project are encouraged. Applicants should submit a pdf document that includes: 1) cover letter describing previous experience and fit to the position, 2) full CV, and 3) contact information for 3 references. For more information about the Latch lab see: http://people.uwm.edu/latch/. UW-Milwaukee has an active group of researchers studying evolutionary genetics and behavior: https://pantherfile.uwm.edu/rafa/www/BME%20site/BME%20home.htm Applications and all queries should be sent to Emily Latch at latch@uwm.edu. Review of applications will begin Sept. 1, but will continue until the position is filled.

Emily Latch

Assistant Professor

Dept of Biological Sciences

University of Wisconsin-Milwaukee

Milwaukee, WI 53211

Emily K. Latch Assistant Professor Dept. of Biological Sciences University of Wisconsin - Milwaukee 3209 N. Maryland Ave. Milwaukee, WI 53211

Email: latch@uwm.edu Tel: 414-229-4245

Emily K Latch <latch@uwm.edu>

## UWyoming EvolutionaryBioinformatics

Postdoctoral Position in Evolutionary Bioinformatics

A Postdoctoral Research Position is currently available in evolutionary bioinformatics. The position will be joint between the groups of David Liberles and Jessica Siltberg-Liberles at University of Wyoming. Applicants should have good programming skills and a publication record in computational comparative genomics, structural bioinformatics and/or molecular evolution. The Liberles Group works in comparative genomics, and mechanistic molecular evolution. The Siltberg-Liberles group works in evolutionary structural bioinformatics. For more details on research in the groups, please see

http://www.wyomingbioinformatics.org/LiberlesGroup and

http://uwacadweb.uwyo.edu/uwmolecbio/Faculty/J_Liberless_Files/research.htm . University of Wyoming is located in Laramie, WY, 2 hours north of Denver in the rocky mountains. It is an ideal location for those with interests in skiing (both downhill and cross country), rock climbing, hiking, ....

To apply, please send a CV contact information for three references to liberles@uwyo.edu and to jliberle@uwyo.edu. Informal inquiries before application are welcome. Initial review of applicants will begin on August 31, 2010 and continue until the position is filled.

David Liberles <liberles@uwyo.edu>

# WorkshopsCourses



## Plon Germany EvolutionaryGenetics Sep28-Oct1 DeadlineSep1

We have extended the deadline for the workshop to Sept, 1st 2010.

Confirmed speakers in include: Hopi Hoekstra, Harvard University Peter Keightley, University of Edinburgh

PhD STUDENT WORKSHOP ON 'EVOLUTIONARY GENETICS' IN PLöN, GERMANY

The newly established working group (GEN-AG) 'Evolutionary Genetics' of the German Society of Genetics organizes its first workshop from 28 September to 1 October in Plön, Germany. The workshop will take place at the Kappelsberg Youth Hostel in Plön, Northern Germany. The venue is located very beautifully and is in close vicinity to the Max-Planck-Institute of Evolutionary Biology.

The workshop aims to establish a network of young scientists who work in the German-speaking countries and use theoretical or empirical approaches to study evolutionary genetic questions ranging from genes to ecosystems. Each participant will have the opportunity to present his or her work in 20 min talks or in a poster session. Three invited speakers will provide an overview of different fields of evolutionary genetics. In addition to the classical program, the workshop will include two so-called 'unconference' sessions, which are self-organized sessions by the participants.

Further information on the workshop, the program and the registration can be found at the following website:

http://web.evolbio.mpg.de/ ˜ harr/home.html The workshop fee be EUR 170.- for a single room and EUR 150.- (per person) in a double room. These costs include all meals. Student members of the GFG (Gesellschaft für Genetik) will be reimbursed for the accommodation, but not for the food (which costs EUR 60.-), when registering with the GFG BEFORE registering for the meeting. A membership form can be downloaded from the website above.

The closing date for registration is Sept, 1st 2010.

The organzing team are Karl Schmid (University of Hohenheim, Stuttgart) as well as Bettina Harr and Emilie Hardouin (both at MPI of Evolutionary Biology, Plön). Please send any further questions regarding the workshop to karl.schmid@uni-hohenheim.de

Bettina Harr PhD Max-Planck-Institut fuer Evolutionsbiologie Abteilung Evolutionsgenetik August-Thienemannstrasse 2 24306 Ploen (Germany)

Tel: ++49 4522 763 287

http://web.mac.com/harrb1/HarrLab/index.html
Bettina Harr <harr@evolbio.mpg.de>

## Salzburg Austria Phylogeography Sep27-Oct5

Phylogeographical Analysis, Workshop and PhD/Master course (Nr.: 437.112)

Phylogeography literally combines phylogeny with biogeography and investigates the geographic distribution of intra- or interspecific genetic variation. Observed patterns reflect the biogeographical and evolutionary history of a species or a species complex. Phylogeographic studies address questions about colonization pattern, historical range contractions or expansions in reaction to past climate change or other environmental influences, ice age refugia or hybridization. The phylogeographic approach has become increasingly important in taxonomic research as well as in the field of conservation biology. Methodologically, phylogeography combines elements of population genetics, phylogeny and historical biogeography. Despite its original focus on genetic lineages and sequence data, also allele frequencies and other types of genetic data are fre-

quently used. In this course we will introduce the theoretical basis of phylogeography, genetic markers used, and data analysis. The main part will be a computer course in analysing and interpreting phylogeographic data based on model datasets and/or data sets of participants.

. Where: University of Salzburg, Faculty of Natural Sciences, Hellbrunnerstrasse 34, 5020 Salzburg, Austria . When: Monday, 27.9.2010 – Tuesday, 5.10.2010 . Course fee: 200 æ (excluding food & hotel)

Course leaders: . Dr. Dorothee Ehrich (University of Troms©, Norway) works on the ecology and phylogeography of arctic animals and plants. . Dr. Andreas Tribsch (University of Salzburg, Austria) works on the evolution and phylogeography of alpine and arctic-alpine plants.

Salzburg is located 150 km east of Munich and 300 km west of Vienna and can be reached via: .Train, Salzburg (or Munich) Airport

The course is limited to 25 participants. Minimum attendance is 15 participants. (Priority will be given to PhD students, but Master students and Postdocs/researchers are very welcome, too. First come, first serve). Please send a short application asap (including title of master/PhD thesis, motivation for participation in few lines, type of own molecular data, in case you have any, etc.) and questions to andreas.tribsch@sbg.ac.at. Notification of acceptance and more information: latest September 10th 2010.

With regards, Andreas Tribsch University of Salzburg, Department of Organismic Biology, /Ecology and Diversity of Plants, Hellbrunnerstrasse 34, A-5020 Salzburg, Austria, tel.: ++43/662/80445504, andreas.tribsch@sbg.ac.at

Andreas Tribsch <andreas.tribsch@sbg.ac.at>

# Instructions

Instructions: To be added to the EvolDir mailing list please send an email message to Golding@McMaster.CA. At this time provide a binary six letter code that determines which messages will be mailed to you. These are listed in the same order as presented here — Conferences; Graduate Student Positions; Jobs; Other; Post-doctoral positions; WorkshopsCourses. For example to receive the listings that concern conferences and post-doctoral positions this would be 100010. Messages are categorized on the basis of their subject headings. If this subject heading is not successfully parsed, the message will be sent to me at Golding@McMaster.CA. In addition, if it originates from 'blackballed' addresses it will be sent to me at Golding@McMaster.CA. These messages will only be read and dealt with when I have time. The code 000000 has all channels turned off and hence gets only a once monthly notifcation of the availability of a monthly review pdf file.

To be removed from the EvolDir mailing list please send an email message to Golding@McMaster.CA. Note that 'on vacation', etc, style messages are automatically filtered and should not be transmitted to the list (I hope), but should you wish to avoid the e-mail's your code can be temporarily changed to 000000.

To send messages to the EvolDir direct them to the email evoldir@evol.biology.McMaster.CA. Do not include encoded attachments and do not send it as Word files, as HTML files, as LaTeX files, Excel files, etc. . . . plain old ASCII will work great and can be read by everyone. Add a subject header that contains the correct category "Conference:, Graduate position:, Job:, Other:, Postdoc:, Workshop:" and then the message stands a better chance of being correctly parsed. Note that the colon is mandatory.

The message will be stored until the middle of the night (local time). At a predetermined time, the collected messages will be captured and then processed by programs and filters. If the message is caught by one of the filters (e.g. a subject header is not correctly formated) the message will be send to me at Golding@McMaster.CA and processed later. In either case, please do not expect an instant response.

# Afterword

This program is an attempt to automatically process a broad variety of e-mail messages. Most preformating is collapsed to save space. At the current time, many features may be incorrectly handled and some email messages may be positively mauled. Although this is being produced by LaTeX do not try to embed LaTeX or TeX in your message (or other formats) since my program will strip these from the message.