

# STRI newsletter

July 31, 1992

SMITHSONIAN TROPICAL RESEARCH INSTITUTE - Apartado 2072, Balboa, Panamá

No. 31

## TUPPER CENTER SEMINARS

Tuesday, August 4, noon seminar speaker will be Matthew Parker, State University of New York at Binghamton.

*Parasites & the evolution of sex*

## Next Week

Tuesday, August 11, noon seminar speaker will be Kyle Summers, STRI postdoctoral fellow.

*Dart poison frogs and the interaction of sexual selection with parental investment*

## BCI SEMINAR

Thursday, August 6, Bambi seminar speaker will be Matthew Parker, SUNY-Binghamton.

*Evolution in plant pathogens*

## PEOPLE

### Arrivals

- Carlos Perez Santos, Museo Nacional de Ciencias Naturales, and Ana Moreno, Univ. Complutense de Madrid, Spain, Aug 1-31, to study earthworms on BCI.
- Matthew Parker, SUNY-Binghamton, Aug 3-13, to visit STRI and present seminars.
- Robert Stallard, U.S. Department of the Interior, Colorado, Aug 4-27, to work on a forest hydrology project on BCI.
- Katherine Milton, Univ. of California, Berkeley, Aug 6-23, to continue work on population dynamics of howler monkeys and spider monkeys on BCI.
- Thomas Bresson, SI Office of Protection Services, Aug 2-7, to visit STRI facilities and meet with staff.
- Verdine Fredericks, Employee Assistant Program, Health Services Division, SI, Aug 2-7, to present training session about HIV virus and substance abuse.

### Departures

- Joseph Wright, staff scientist, Aug 2-17, to Honolulu, Hawaii, to attend AIBS meetings.
- Don Windsor, staff scientist, Aug 4-14 to Palo Verde, Costa Rica, to assist with the OTS "Biodiversity" Course.



On Thursday, July 23, Kuna Caciques Carlos López, Armando González y Leonidas Kantule (from the left) and John Christy, Assistant Director for Marine Research, signed the new agreement for the continuation of STRI research activities in San Blas, at the Tupper Center ••• El jueves 23 de julio, los Caciques Kunas Carlos López, Armando González y Leonidas Kantule (iz. a der.) y John Christy, Director Adjunto para Investigaciones Marinas, firmaron el nuevo acuerdo para la continuación de las actividades de investigación de STRI en San Blas en el Centro Tupper.

(Foto: A. Caballero)

- Francisco Rivera, computer specialist, Aug 1-9, to take courses at Nova University and on official business at SI.
- David Roubik, staff scientist, Aug 6, 1992-Mar 1993, leaves on sabbatical for Salt Lake City, Utah.

### August Calendar

- Aug 3 Substance Abuse Training Course, Large Meeting Room, 2:30-4:30 pm.
- Aug 4 Administrative Staff Meeting, Large Meeting Room, 9:30 am-12m.
- Aug 5 AIDS Education Course, Exhibit Hall and Large Meeting Room, 1-4 pm.
- Aug 7 Restricted Endowment Proposals due in the Director's Office.
- Aug 11 Scientific Staff Meeting.
- Aug 17-19 Meeting of the Association of Marine Laboratories of the Caribbean.

**On Leave**

Jul 27-Aug 7 Mercedes Arroyo  
 Aug 3-7 Gloria Zelaya, Ana Maria Ford, Osmila Sanchez Galan, Luis Polanco and Roxana Duran  
 Aug 2-15 Amalia Herrera

**THINGS YOU SHOULD KNOW****Support for Project at STRI**

The Government of Germany has agreed to earmark US\$ 50,000, through the United Nations Environmental Programme, for support of the project "Assessment of biological diversity and microclimate of the tropical forest canopy" at STRI.

**Anniversary Meeting at STRI**

STRI is hosting the 25th annual meeting of the Association of Marine Laboratories of the Caribbean (AMLC), which will take place in Panama City, August 17-22, 1992. During the technical sessions (August 17-19), to be held at the Earl S. Tupper Conference Center, more than 50 speakers representing over 30 different institutions from North and South America will cover a broad range of topics in the marine sciences. Talks will be given in English or Spanish, and translation services will be provided. Proceedings of the conference will be published in a special issue of the *Revista de Biología Tropical*.

During the second half of the meeting, participants can choose among a number of field trips to a variety of marine and terrestrial habitats (Contadora, San Blas, Galeta, Portobelo and BCI). A buffet banquet to celebrate the 25th anniversary of the AMLC will form the highlight of the social events accompanying the conference.

For detailed information on the program of the meeting or registration procedures, please contact Ursula Schober or John Christy at Naos, 28-4022.

**Fellowship Recipient**

Congratulations to Francisco Rivera, winner of the Federal Employee Education and Assistance Fund (FEEA) for the 1992-1993 school year. The amount of the award is \$500.

**Docent Volunteers Needed*****Se Necesitan Guías Voluntarios***

The STRI Office of Education is receiving applications for interested individuals who wish to work as volunteer guides at the new STRI photographic exhibit "Wildflowers of Soberania National Park". Guides will

work with visitors and student groups one to two days per week for eight months, and will receive special training. For more information please contact Georgina de Alba or Marissa Crespo, 27-4918 ••• *La Oficina de Educación del STRI estará recibiendo solicitudes de aquellos individuos interesados en trabajar como guías voluntarios en la nueva exhibición fotográfica "Flores del Parque Nacional Soberanía". Los guías voluntarios trabajarán con visitantes y grupos estudiantiles una o dos veces por semana, durante ocho meses, y recibirán un entrenamiento especial. Para mayor información, comunicarse con Georgina de Alba o Marissa Crespo at 27-4918.*

**Oportunidad para un "Dive Buddy"**

Se necesita "Dive buddy" o compañero de buceo autorizado por STRI para trabajar de inmediato con Héctor Guzmán, por un período aproximado de 4 semanas. El salario será por día trabajado. Para mayor información, llamar a Hector Guzmán al 28-0354 ó 28-4150.

**ANNOUNCEMENTS****New Books at the STRI Bookstore**

*The Causes of Molecular Evolution* by John H. Gillespie (\$35.00). The book is divided into three parts. The first part summarizes the experimental literature on genetic variation that is most relevant to the issue of the origin and maintenance of genetic variation. The second part addresses the mathematical theory of selection in a fluctuating environment. The third part uses these analyses to assess the scientific status of two competing theories for the maintenance of genetic variation. Steeped in the enormous advances population genetics had made over the past 25 years, this book will be of interest to geneticists, biologists, evolutionary theorists, and bio-mathematicians.

*The Last Rain Forests*, edited by Mark Collins (\$35.00). The Last Rain Forests is an authoritative, comprehensive, and —with more than 200 full color photographs and maps— stunningly beautiful guide to the people, flora, and fauna of the richest habitats on earth. Prepared in collaboration with the International Union for Conservation of Nature, a consortium of some 500 major conservation organizations around the globe, and the World Conservation Monitoring Centre, this is the first popular reference to map the world's rain forests, spell out the problems facing these regions, and propose realistic strategies for ensuring their survival.

**For Sale**

1981 Datsun, 2-door sedan, excellent motor, no A/C, manual drive. \$2,000. If interested call Argelis Roman at 26-2063 after 7 pm.

### Annual Request for Proposals to SI Women's Committee

In February 1992, the Smithsonian Women's Committee granted \$216,435 to fund 24 projects representing 14 museums and offices. STRI personnel are invited to submit proposals to the Women's Committee for consideration in 1992-93.

While the Committee maintains its commitment to funding small projects (\$1000 to \$10,000), this year it will consider funding a few projects of up to \$50,000. Although all projects are carefully reviewed for merit, requests for larger sums will receive additional scrutiny. The Women's Committee would like to expand the scope of its funding, so they particularly encourage bureaus and offices never awarded funds to apply.

The deadline for submission of proposals is September 30, 1992. For further information please call the STRI Directors' Office.

### Asociación de Becarios Fulbright-Panamá

Se complace en invitarlos a la próxima Reunión-Cena, que se llevará a cabo el día martes 4 de agosto de 1992 en el Salón Oriental del Restaurante Lung Fung, de 6:30-10 pm.

En esta ocasión, el orador será Rodrigo Arosemena, Director General de Aduanas, quien disertará sobre el interesante tema *El Papel de la Dirección General de Aduanas en la Erradicación del Tráfico Ilegal de Drogas en Panamá*.

El costo del cubierto será de \$10.00 por persona. Las reservaciones serán aceptadas hasta el día lunes 3 de agosto de 1992, en los teléfonos 27-1777, exts. 2390 ó 2243 (Belsi Medina o Ileana Ortía) o al 27-4393/2085, ext. 367 (Ritter N. Diaz).

### Exposición China

La Embajada China en Panamá y el Instituto Nacional de Cultura presentan la exposición de pintura *Chen Chi Mao*, del 24 de julio al 27 de agosto de 1992 en la Sala de Exposiciones del Museo Reina Torres de Arauz, en conmemoración del V° Centenario del "Encuentro de Dos Mundos".



Jorge Ventocilla, Office of Education and Conservation shows the new BCI nature trail "Fausto" to children from Las Pavas School. This is part of a new environmental educational program to be developed at Las Pavas. Jorge Ventocilla de la Oficina de Educación y Conservación muestra un camino de arrieras a niños de las Pavas en el nuevo Sendero Natural "Fausto" en Barro Colorado. Un nuevo programa de educación ambiental se ha iniciado con la escuela de esta comunidad.

(Foto: M.A. Guerra)

## COURSES/CONGRESSES

### International Institute for Hydraulic and Environmental Engineering

In October 1990, IHE started the first course on Advanced Environmental Sanitation. The third course on Advanced Environmental Sanitation will start in October 1992.

This course, as developed by this Institute, focuses on the environmental sector in the World. The target group consist of professionals (engineers, chemists, micro-biologists with at least B.Sc. degree) who are actively involved and have a number of years of experience in the environmental field.

The course, which has a duration of one-year and will be conducted in Delft, The Netherlands, leads to a well-organized IHE post graduate diploma.

Applications and request for additional information and brochures can be directed to the Registrar of IHE, P.O. Box 3015, 2601 DA Delft, The Netherlands. Telephone 31-15-783404 or fax 31-15-122921.

### From: 365 Ways to Save our Planet • Page-a-Day Calendar •

More soap products are becoming available in shoft plastic pouches. Use them with refillable containers, and you'll help to reduce the garbage each of us tosses— about 3.5 pounds every day.



**American Training Institute**

Anuncia su primer curso especializado para guías de turismo ecológico en cooperación con Eco-Tours de Panamá. El curso se llevará a cabo a partir del 1 de agosto, tres sábados por mes de 8 am a 5 pm por 10 meses.

Los temas incluyen la observación e identificación de los animales, aves, insectos, reptiles y plantas de los ecosistemas panameños, primeros auxilios, RCP, relaciones humanas, sobrevivencia en la selva, manejo de grupos turísticos etc. El programa está dividido en seminarios de clases con visitas al campo para observación y entrenamiento.

Los estudiantes sobresalientes de este programa tendrán la oportunidad de trabajar en la giras de Eco-tours de Panamá. Al concluir el curso podrán ser contratados como guías calificados de Eco-Tours o con otra empresa. Este programa está apoyado por el IPAT.

Para mayor información llame al 36-4493 ó 36-4494.

**Video Series "The Buried Mirror"****Serie de Videos "El Espejo Enterrado"**

The STRI Office of Education will present the second video in the series by Carlos Fuentes "The Buried Mirror" on August 18. For those who missed the showing of the first video of the series on July 25, contact Jorge Ventocilla, Tupper Center, for a second presentation ••• La Oficina de Educación de STRI presentará el segundo video de la serie de Carlos Fuentes "El Espejo Enterrado" el 18 de agosto. Para aquellos que no pudieron ver el primer video de la serie el 25 de julio, pueden comunicarse con Jorge Ventocilla en el Centro Tupper, para una segunda presentación.

**STRI NEW PUBLICATIONS**

- Coates, Anthony G., Jackson, Jeremy B.C., Collins, Laurel S., et al. 1992. "Closure of the Isthmus of Panama: The Near-Shore Marine Record of Costa Rica and Western Panama." *Geological Society of America Bulletin* 104: 814-828.
- Enstrom, David A. 1992. "Delayed Plumage Maturation in the Orchard Oriole (*Icterus spurius*): Tests of Winter Adaptation Hypotheses." *Behavioral Ecology and Sociobiology* 30: 35-42.
- Kato, Makoto, Roubik, David W. and Inoue, Tamiji. 1992. "Foraging Behavior and Concentration Preference of Male Euglossine Bees (Apidae: Hymenoptera)." *Tropics* 1(4): 259-264.
- McClearn, Deedra. 1992. "Locomotion, Posture, and Feeding Behavior of Kinkajous, Coatis, and Racoons." *Journal of Mammalogy* 73(2): 245-261.
- Smith, Neal G. and Fleischer, R. 1992. "Giant Cowbird Eggs in the Nests of Two Icterid Hosts: Discrimination of Species and Individuals with Protein Electrophoresis Markers and Egg Morphometrics." *Condor* 94: 572-578.

**FROM OTHER SOURCES****Billion Bites the Dust**

taken from *Nature*, Vol. 358, 2 July 1992

*Nature* hereby abandons a tradition that has served it well, if increasingly awkwardly, for close on 125 years. In this issue and from now on, the English word 'billion' will be understood as meaning  $10^9$  rather than  $10^{12}$ . It is earnestly hoped that readers will not mistake this upheaval in editorial practice for the witless indulgence of innovation for its own sake. Rather, it is a case where tradition has been overwhelmed by others' usage.

For many years, it has been difficult to dragooon correspondents into describing say, the US federal deficit as "close on \$500,00 million"; their base inclination is to say "\$500 billion", this journal's belief that even the US federal deficit cannot amount to  $\$5.10^{14}$  in this or even the next presidency notwithstanding. Similarly, there have been difficulties over the age of the Earth, henceforth 4.5 billion years (but not, yet, '4.5 b.y.') More to the point, confusion about the meaning of 'billion' has created circumstances in which the word can hardly be used at all. To say that the US Gross National Product is a "few billion dollars" (which is true if one billion is  $10^{12}$ ) would seem demeaning to US taxpayers, most of whom consider themselves to be collectively three orders of magnitude better off. So the use of a valuable word has been sterilized and circumlocutions such as "500,000 million" have proliferated.

That is why, after a long struggle, it will in the future be permissible for correspondents and contributors to use 'billion' in the sense of  $10^9$ . It is, however, of the utmost importance that writers and would-be writers, whose frequent inventiveness in the use of words is often matched only by their indifference to the ugliness of what they thus do, should not regard this momentous change as a sign that the flood-gates are about to open. In particular, the word 'trillion' (for either  $10^{12}$  or  $10^{18}$ ) will not be used except in direct quotations. Despite the permissiveness of Fowler's *Modern English Usage*, infinitives will not be split. And while nouns such as 'walk' are also verbs, not every noun can be dealt with in that way, as in the "sample was aliquoted...". There must, after all, be some standards.

**Last Minute News**

Elizabeth Kalho received a FRITZ Frank Award from the German Society of Mammalogy for her outstanding doctoral thesis. She will be giving a talk on BCI on Wednesday, Aug 5, on her on-going work at 7:30 pm. Transportation can be arranged through Vielka Liao, BCI.