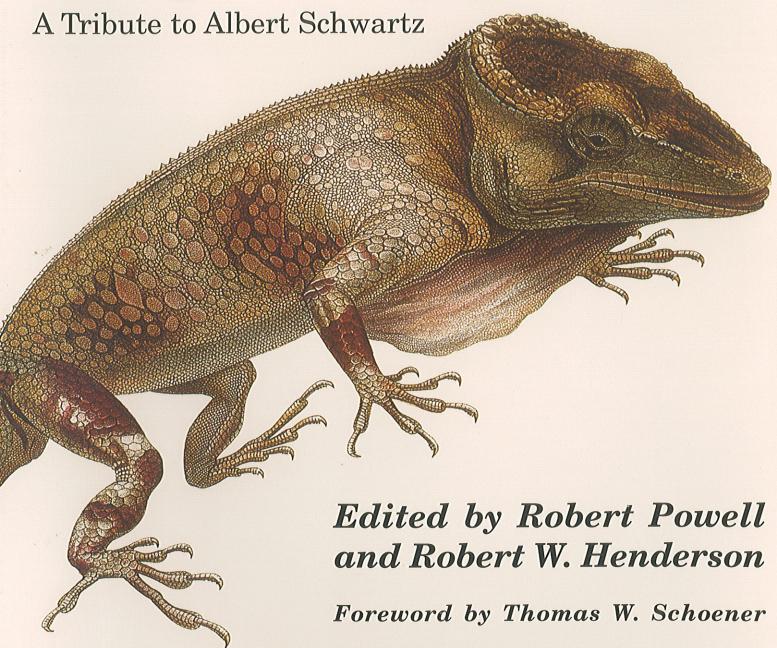
# Contributions to

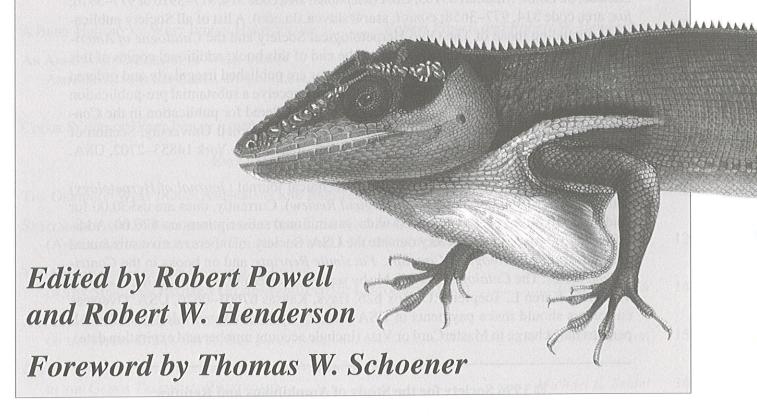
# West Indian Herpetology



Published by the Society for the Study of Amphibians and Reptiles

# West Indian Herpetology

A Tribute to Albert Schwartz



Published by the Society for the Study of Amphibians and Reptiles • 1996



## TABLE OF CONTENTS

Patrons of This Volume		mT
Foreword		
Introduction	nd Robert W. Henderson	1 PAT
ALBERT SCHWARTZ		
REMEMBRANCES OF ALBERT SCHWARTZ:		
Albert Schwartz: Dawning of a Herpetologist		1:
Recollections of Albert Schwartz		10
A Singular Devotion: Albert Schwartz and the West Indies		18
HERPETOLOGICAL PUBLICATIONS OF ALBERT SCHWARTZ	Robert W. Bourgeois	21
West Indian Herpetology	USTEOPILUS SEPTENTRIONALE FUGILITION OR SEVELAL SE	
A Brief History of West Indian Herpetology Robert Powell and	nd Robert W. Henderson	29
An Annotated Checklist of West Indian  Amphibians and Reptiles	l, Robert W. Henderson,	T /51
COLOR PLATES OF WEST INDIAN AMPHIBIANS AND REPTILES	following pag	ge 94
EVOLUTION, SYSTEMATICS, AND BIOGEOGRAPH	ANCH OF SPATIAL MICHE PA	
THE ORIGIN OF WEST INDIAN AMPHIBIANS AND REPTILES	S. Blair Hedges	95
Systematics and Biogeography of Eastern Caribbean <i>Eleutherodactylus</i> (Anura: Leptodactylidae): Consensus from a Multidisciplinary Appr		129
The Relationships of the Hispaniolan Frogs  of the Subgenus <i>Pelorius</i> ( <i>Eleutherodactylus</i> : Leptodactylidae)		141
A Karyological Perspective on the Monophyly of the Hylid Genus Osteopilus		157
Current Status of Biogeography of the West Indian Turtles in the Genus <i>Trachemys</i> (Emydidae)		
RELATIONSHIPS AMONG WEST INDIAN GECKOS OF THE GENUS SPHAERODACTYLUS: A PRELIMINARY ANALYSIS OF MITOCHONDRIAL 16S RIBOSOMAL RNA SEQUE		175

### EVOLUTION, SYSTEMATICS, AND BIOGEOGRAPHY (continued)

CAREENING ISLAND AND THE GOAT ISLANDS: EVIDENCE FOR THE ARID-INSULAR INVASION WAVE THEORY OF DICHOPATRIC SPECIATION IN JAMAICA	101
CROSSING BOND'S LINE: THE HERPETOFAUNAL EXCHANGE	195
BETWEEN THE EASTERN CARIBBEAN AND MAINLAND SOUTH AMERICA	207
ECOLOGY AND BEHAVIOR	
THE ROLE OF AMPHIBIANS AND REPTILES	
IN A WEST INDIAN RAIN FOREST FOOD WEB	217
PATTERNS OF PARENTAL CARE IN FROGS OF THE GENUS ELEUTHERODACTYLUS Daniel S. Townsend	229
MATE SELECTION IN THE PUERTO RICAN FROG, ELEUTHERODACTYLUS COQUI	241
BIOLOGY OF THE PUERTO RICAN CAVE-DWELLING FROG, ELEUTHERODACTYLUS COOKI.	ra Si
AND SOME RECOMMENDATIONS FOR ITS CONSERVATION	251
Larval Habitat, Ecology, and Parental Investment  of Osteopilus brunneus (Hylidae)	259
	271
THE EVOLUTION OF SEXUAL SIZE DIMORPHISM IN THE TEIID LIZARD  AMEIVA PLEI: A TEST OF ALTERNATIVE HYPOTHESES	277
Morphology, Ecology, and Behavior of the Twig Anole,  Anolis angusticeps	
A Test of Assortative Mating between Sibling Lizard Species,  Anolis Websteri and A. Caudalis, in Haiti	303
EVIDENCE OF SPATIAL NICHE PARTITIONING BY A HISPANIOLAN LIZARD COMMUNITY IN A XERIC HABITAT	317
DIETS OF WEST INDIAN RACERS (COLUBRIDAE: ALSOPHIS):  Composition and Biogeographic Implications Robert W. Henderson and Richard A. Sajdak	
Ecological Patterns in Greater Antillean Macrostomatan Snake Assemblages, with Comments on Body-size Evolution in <i>Epicrates</i> (Boidae) <i>Javier A. Rodríguez-Robles</i>	auf
and Harry W. Greene	339
Conservation wood and authorized a monocorran	
Species Richness and Biogeography of the Herpetofauna in the Exuma Cays Land and Sea Park, Bahamas C. Kenneth Dodd, Jr. and Richard Franz	NO OUR
Declining Amphibian Populations in Puerto Rico Rafael L. Joglar and Patricia A. Burrowes	359
The Current Status of Sea Turtles in Haiti	371
Jose A. Uttenwalder	381

### Conservation (continued)

Conservation Strategy for the Jamaican Iguana, Cyclura collei	395
Conservation of <i>Epicrates monensis</i> on the Satellite Islands of Puerto Rico <i>Peter J. Tolson</i>	407
Corallus hortulanus (Serpentes: Boidae) in the Post-Columbian West Indies:  New Habitats, New Prey Species, and New Predators	417
Conservation of the American Crocodile ( <i>Crocodylus acutus</i> )  In the Dominican Republic	425
ABSTRACTS again for a specific state of the second state of the se	
Abstracts of Additional Papers Presented at the Symposium in Honor of Albert Schwartz:	
Pre-Columbian Human Influences on the Biogeography of Amphibians and Reptiles in the Yucatan Peninsula	435
Population Differentiation of <i>Iguana delicatissima</i> and <i>I. iguana</i> in the Lesser Antilles	436
Long-term Study of Activity Patterns of Puerto Rican Rain Forest Frogs	437
Developmental Migrations and Habitat Use of Green Turtles in the Bahamas	440
Harmful Prey Aversion in Hatchling Anolis lineatopus:  Learning the Good Things First	441
Anoline Diversity in Three Differentially Altered Habitats in the Sierra de Baoruco,  Dominican Republic, Hispaniola	
Learning and Memory in Anolis Lizards Sharoni Shafir and Jonathan Roughgarden	443
The Relationship between Habitat Use and Sexual Dimorphism among Caribbean Anoles	444
Social Control of Male Reproductive Success in Ameiva exsul	445
customers should make payments in xaqui ads or by international Moresens	
INDEX TO SCIENTIFIC NAMES	451

### SERIES EDITOR'S NOTE

The Society is grateful to Robert Powell and Robert W. Henderson for organizing the 1994 symposium which provided the basis for this volume and for their careful editing of the manuscripts. We are also obliged to the persons and organizations whose financial contributions have made possible the inclusion of the color plates; they are listed on the patrons' page (page 8). The series editor thanks Richard Glor for his editorial assistance.

The frontispiece, a photograph of Albert Schwartz taken in the 1970s, is provided through the courtesy of Michael H. Strahm. The illustration on the title page is of *Anolis equestris* of Cuba, drawn by Jean Gabriel Prêtre (from Ramón de la Sagra's "Historia Física, Política y Natural de la Isla de Cuba," Paris, 1838–1861). The headpiece to the chapters was drafted by Christopher L. Lane; it depicts *Cyclura cornuta* from the Dominican Republic. The tailpiece to each chapter figures *Eleutherodactylus schwartzi* of the Virgin Islands; it was portrayed by Karen Bertrand.

### CONTRIBUTIONS TO HERPETOLOGY, VOLUME 12

Kraig Adler, Editor Timothy D. Perry, Associate Editor

Volumes in the *Contributions to Herpetology* series can be purchased from the Publications Secretary, Robert D. Aldridge, Department of Biology, St. Louis University, 3507 Laclede, St. Louis, Missouri 63103, USA (*telephone*: area code 314, 977–3910 or 977–3916; *fax*: area code 314, 977–3658; *e-mail*: ssar@sluvca.slu.edu). A list of all Society publications, including those of The Ohio Herpetological Society and the *Catalogue of American Amphibians and Reptiles*, is printed at the end of this book; additional copies of this list are available from Dr. Aldridge. *Contributions* are published irregularly and ordered by separate subscription, although Society members receive a substantial pre-publication discount. Authors who wish to have manuscripts considered for publication in the *Contributions* series should contact the Editor: Kraig Adler, Cornell University, Section of Neurobiology and Behavior, Seeley G. Mudd Hall, Ithaca, New York 14853–2702, USA.

Members of the Society receive a quarterly technical journal (*Journal of Herpetology*) and a quarterly news-journal (*Herpetological Review*). Currently, dues are us\$30.00 for students, \$40.00 for all others, world-wide; institutional subscriptions are \$70.00. Additional \$30.00 for airmail delivery outside the USA. Society members receive substantial discounts on *Herpetological Circulars, Facsimile Reprints*, and on books in the *Contributions* series. The *Catalogue* is available by separate subscription. Apply to the Society's Treasurer, Karen L. Toepfer, P.O. Box 626, Hays, Kansas 67601–0626, USA. Overseas customers should make payments in USA funds or by International Money Order. All persons may charge to MasterCard or VISA (include account number and expiration date).

### © 1996 Society for the Study of Amphibians and Reptiles