MINUTES OF THE MEETINGS OF THE INDIANA ACADEMY OF SCIENCE 2008

MEETING OF THE COUNCIL

University of Evansville 18 April 2008

In attendance: Nils Johansen, Edward Frazier, Bill McKnight, David Daniell, Jim Berry, Kristy Miller, Dale Edwards, Mike Foos, Rex Strange, Uwe Hansen, Paul Rothrock, Donald Ruch, Jim Bandoli, and Nelson Shaffer. The meeting was chaired by President Nils Johansen and hosted by Local Arrangements Chairs Dale Edwards and Kristy Miller.

Treasurer Ed Frazier presented the Account Summary that showed a balance of \$76,141.30 as of 31 March 2007. The 2007 year-end financial report detailed operating, restricted and Foundation funds. The Academy is in the black and the Foundation Funds have grown from last report. Foundation funds used to support the *Proceedings*, research grants and the special Natural Heritage Project totaled \$103,977.95.

Executive Director Nelson Shaffer reported that membership was normal for this time of year with 608 members. He reported about progress on the *Natural Heritage of Indiana* video effort and that copies of the four-part series would be provided to each school in Indiana along with materials. He also received permission to investigate sponsoring a Hoosier Science Day to promote science in the state. Bill McKnight began a discussion about the need for a Spring meeting.

Jim Berry updated the *Proceedings* status.

Don Ruch called for newsletter items and gave deadlines. He also presented a number of graphics to be considered as the new logo for the Academy. Three were selected for further vetting.

Paul Rothrock, President-Elect, outlined his plans.

President Nils Johansen reported on the upcoming meeting with a recap of his term.

Frank Guthrie gave a detailed report on the Academy Foundation Funds. The committee is pleased with the new fund managers, and the fund grew nicely despite the poor economy.

Jim Bandoli summarized the research grant activities.

David Daniell reported that IU-Kokomo campus has agreed to host the 2009 meeting.

Dale Edwards gave deadlines for Fall meeting activities.

Bill McKnight reported on the status of publications, especially reprinting of *Plants of the Chicago Region*. Bill requested funds to purchase a camera to help finish his book about mosses of Indiana. Funds were approved.

Anika Williams reported that 148 new volumes were added to IAS holdings. She requested and was granted \$2,000 to provide materials to archive Academy images, correspondence and miscellaneous items in the State Museum Archives.

Patty Zeck reported that several participants in the State Science Fair were IAS student grant winners. The 2008 Science Talent Search will be held in October and the Junior Academy in November.

Damian Schmelz tendered a written report about Natural Resources Commission activities. Routine actions were adapted, and discussions about proposed logging in the Morgan-Monroe Forest and Yellowwood Forest were held.

The meeting closed with Dale Edwards detailing the dinner and field trips that would conclude the Spring meeting.

Respectfully submitted, Heather Bruns Secretary

MEETING OF THE COUNCIL

University of Evansville 23 October 2008

The following individuals were in attendance: President Nils Johansen; President-Elect Paul Rothrock; Immediate Past-President John Schutt; Treasurer Edward Frazier; Secretary Heather Bruns; Executive Director Nelson Shaffer; Research Grants Committee Chair Sandra Brake; Speaker-of-the-Year Uwe Hansen; Newsletter

Editor and Chair of Biodiversity and Natural Areas Committee Don Ruch; Local arrangements Committee Chair Dale Edwards; Nominations and Elections Committee Chair Michael Foos: Editor of the Proceedings Jim Berry; Representative to the Indiana Natural Resources Commission Damian Schmelz: Finance Committee Chair Edwin Squiers; Biodiversity and Natural Areas Committee Daryl Karns; Zoology Section Chair Rex Strange; AAAS Representative Brent Summers: Programs and Invitations Committee Chair Dave Daniell; Science Education Section Chair Courtney Hall; Environmental Quality Section Chair, Jarmila Popovičová; Publications Committee Chair Bill McKnight; and Student assistant Joshua Key.

President Nils Johansen called the meeting to order at 3:09 PM. There was an approval of the agenda. A motion to amend new business was made (add Central Indiana Land Trust to new business). Motion to approve the amended agenda was unanimous.

The minutes of the previous meeting (18 April 2008, University of Evansville) were distributed. There was a motion to postpone the approval of the amendments—approved. Members should send changes regarding the Spring meeting minutes by e-mail to Heather Bruns.

INDIVIDUAL REPORTS

Treasurer's report.—Ed Frazier reported that finances are as expected. Frank Guthrie was unavailable to report on the specifics of the Foundation finances. Ed provided an account summary report.

Executive Director.—Nelson Shaffer provided a membership report. Associate category membership has declined. The *Natural Heritage of Indiana* video will be picked up by all public broadcasting stations after WFYI (Indianapolis) has completed its run. Additionally, a Kentucky station has picked up this video series. The investment in this program was very beneficial for IAS.

Proceedings editor.—Jim Berry reported that the next issue of *Proceedings* will go to press shortly. Two issues are published per year. Jim noted that the papers being published are providing very valuable information about the biology of Indiana. The last 10 years of the *Proceedings* is online (1999–2008), available as pdf

files. Jim also noted that we are receiving more papers from non-academic members, reporting on findings important to the state.

Newsletter editor.—Don Ruch reported the August newsletter did not get mailed out. Don proposes that a short edition of the August newsletter will contain the information about the people running for various offices and include the ballot. It is hoped that ballots will be received by 1 November, and the ballot should be returned by 25 November. This is only a three week time period, which does not follow the Constitution guidelines of four weeks. A motion to approve three week time period was approved.

Secretary.—Heather Bruns had no new business to report.

President-elect.—Paul Rothrock raised the issue of moving the main Fall meeting to the Spring. In addition, he noted that several prominent positions have members that would like to step down and need to be filled. It was also mentioned that we need to have increased communication with Don Ruch about the newsletter and expand the information it contains.

President.—Nils Johansen discussed what will need to be done in upcoming months. We will need to find a new publications chair in a timely manner. Additionally, we need to consider how to move our organization forward, particularly in terms of electronic communication. Uwe Hansen commented that Nils was a wonderful secretary and is a great President and wanted to express thanks.

The question was raised "Can the Table of Contents of the *Proceedings* be included in the newsletter?" That would save us from having to send out *Proceedings* because people could view the table of contents and then find the article of issue in the *Proceedings* online. Discussion followed about making print versus online availability as an option. General consensus was that the Table of Contents could be included in the newsletter, and there was no specific reason not to do this.

COMMITTEE REPORTS

Academy Foundation.—Frank Guthrie is in poor health. No report was provided to Ed Frazier or Nelson Shaffer to be given to the Council at this time. To sum, Frank, Stan, and Wendell use Merrill Lynch as financial advisors for the stock that supports Foundation money. Everything is as expected financially.

Research grants.—Sandra Brake submitted a grant report for review by the Council. For the Spring 2008, 60% of the total budget was allocated for the grants and 40% to Fall round of grants. However, we received more Spring senior grant proposals than Fall senior grant proposals. Discussion followed regarding making a 50/50 split in the allocation of money. Sandra will talk with the committee about making the allocation change. A decision will be made at the December budget meeting. Paul Rothrock inquired about the publicity of the junior grants. It was suggested that winners of the junior awards be announced along with the senior awards. Ed Frazier stated that he includes this information in a report for the senior grants and submits it to Don Ruch for the newsletter. He will do this for the junior grants as well. Ed Squiers asked if information about the awardees could be published in local newspaper for publicity. There was discussion about whom or what committee would be in charge of this. John Schutt suggested that awardee information should be published on the website. No specific consensus was reached.

Program and invitations.—Dave Daniell submitted a written report. This report listed meeting sites since 1950. IU-Kokomo is the proposed location for the 2009 meetings. No location ideas have been submitted for 2010.

Nominations and elections.—Mike Foos reiterated that the elections for 2008 did not occur. In the aftermath of troubles with the elections and complications with abstract submission and notification for this meeting, Mike proposed a move towards electronic communications. He presented a formal motion that the President generate a special committee to investigate this proposal in electronic communication. Discussion followed as described below.

Ed Frazier commented that the HASTI organization has recently gone through this change, and now they do most items online that are listed in the proposal from Mike. Ed commented that these changes progressed smoothly but were costly.

Nils asked for discussion on what could be done to assist Mike with this proposal. Suggested members include Don Ruch, Ed Frazier, Nelson Shaffer, Jim Berry, Heather Bruns, Bill McKnight, Courtney Hall, Dale Edwards (tentatively), and Uwe Hansen (tentatively). Marcia Moore was asked to be involved. Nils requested that a firm outline of proposed changes be presented at the Spring meeting. A motion for

addition of a special committee to investigate the proposal was approved.

Publications.—Bill McKnight presented an advance copy of Mammals of Indiana. It will be sold for \$75 by IU Press. IAS will be offering it for \$55. The IAS is not mentioned anywhere in the book, despite our financial contribution. Bill discussed this with the producer of the book. Natural Heritage of Indiana is available through IAS for \$35. IAS has received six requests to use illustrations, for classroom publications, that are IAS property. Bill declined these requests since we plan to republish these illustrations in the future. IAS invested money into these publications, and Bill did not feel they should freely be given away. The discussion following indicated that the council agreed with Bill.

Bill had some examples for a possible new IAS logos available and would like input. He will send the secretary a labeled file of the logo options. She will send the file out to Council members and request that opinions/comments be sent to the secretary for discussion at the December meeting.

Finance.—Ed Squiers requested that Paul Rothrock appoint a new chair for the Finance committee next year.

Youth activities.—Patty Zeck (Junior Academy, Science Talent Search) was not in attendance, but Nelson presented the report for Patty.

Library, Archivist.—Anika Williams was absent due to maternity leave, but Nelson provided a hard copy of her report. Doug Conrads is currently filling in for Anika.

Amendments.—No new business.

Awards.—Clare Chatot announced that Eric Knox, IU herbarium, was nominated to be a Fellow of the Academy. A motion to elect Eric B. Knox as a Fellow of the IAS was approved. Donald G. Ruch of Ball State will be awarded the Special Services Award. There were no nominations for Distinguished Service Award.

Biodiversity and Natural Areas.—Paul Rothrock reported that the Biodiversity Blitz will start at 2 PM on Friday and that a meeting will be held tonight to discuss future plans.

Webmaster.—Marcia Moore was not in attendance, but Jim Berry handed out her report.

Speaker of the Year.—Uwe Hansen said that nominations are open.

Representative of INRC.—Damian Schmelz submitted a written report. Damian will be stepping down as the representative as of December 2008.

Representative to AAAS.—Brent Summers submitted a written report. Brent was approached by

the Ohio Academy of Science director to see if there was any interest in a joint meeting in coming years, funded primarily by Ohio. There was interest in the venture. Brent was asked to inquire about more detailed information and provide a follow-up report.

Historian.—Bill Gommel was absent. Nelson Shaffer reported for Bill, announcing that Holly Oster and Lawrence Shaw have passed away and asked for a moment of silence.

OTHER BUSINESS

A reminder of meeting times was given by Nils. Uwe Hansen reminded the members of the presentation in Wheeler Auditorium tonight (Musical Acoustics) at 7:30 PM and its importance in publicizing IAS. Nils thanked Uwe for his organization and follow-up for this presentation.

NEW BUSINESS

Ed Frazier moved that the IAS endorse (in spirit, not financially) the Central Indiana Land Trust obtaining the community forest area of Crown Hill Cemetery in Indianapolis, Indiana. Bill commented that IAS has a history of financially supporting the preservation of natural areas. Nelson asked if they would allow the area to be used for scientific exploration and educational purposes. Yes, this would be allowed. The motion to support the endorsement was approved.

Discussion regarding when the meetings should occur is as follows. Academic schedules need to be considered when considering moving the meeting. A motion to have the President form a special committee to investigate meeting options was approved. The committee will include Nils, Popovičová, and Dave Squiers. Jarmila Popovičová made a few comments: Goshen College would be great for a 2010 meeting site. Regarding grants covering mileage and travel, we cover only \$0.11 per mile. Perhaps this could be reconsidered and increased. Nils proposed that the grants committee investigate this and perhaps increase funding for travel. Lastly, A section chair expressed frustration about the lack of organization and instruction about being a section convener. This discussion has been noted and identified as an important impetus for upgrading to electronic communication.

The meeting was adjourned at 5:17 PM.

Respectfully submitted, Heather A. Bruns Secretary

BUDGET MEETING

Butler University 6 December 2008

The meeting was called to order at 10:13 AM by Paul Rothrock. In attendance: Paul Rothrock, President; Ed Frazier, Treasurer; Heather Bruns, Secretary; Nelson Shaffer, Executive Director; Nils Johansen, Past-President; Patty Zeck, Youth Activities; Dave Daniell, Chair of Programs & Invitations; Frank A. Guthrie, Academy Foundation; Donald G. Ruch, Editor of the Newsletter; Bill McKnight, Chair of Publications.

Ed Frazier gave a summary report of the budget. He made a motion to adopt the budget as presented. Don Ruch seconded the motion.

Vote on the addition of a website contingency fund for \$5000 was unanimously approved.

Vote on the suspension of the \$6000 High School Teacher Fellowship was unanimously approved.

Clarification for the technical initiatives (\$200 for special projects associated with individual sections) was discussed. The agreed-on procedure is that the \$200 will be given as an honorarium. Any request, such as a need for travel expenses, needs to be made to the President. Any additional money given is at the discretion of the President and will come from the President's discretionary fund.

There was a vote on the Indiana Library Operations funding to come from the Lilly Library Fund, and it was unanimously approved.

There was a vote on the funding for high school students that is to come from the invested income account (\$3800) as budgeted and an additional \$1000 from the Academy Foundation Account, and it was unanimously approved.

The budget, as amended, was unanimously approved.

The meeting was adjourned at 11:55 AM.

Respectfully submitted, Heather A. Bruns Secretary

INDIANA ACADEMY OF SCIENCE 2008 Year End Financial Report

		Balance 1-Jan-08	Revenues	Expenses	Balance 31-Dec-08	
OPI	ERATING FUND					
	Dues		20,610.00			
	Interest		974.41			
	Misc. Income		237.26			
	Spring Meeting		182.00	156.98		
	Annual Meeting		5,310.00	6,134.33		
	Officer's Expenses			5,050.00		
	Operating Expenses			4,966.81		
	Financial Expenses			2,024.53		
	Newsletter Expenses			1,718.54		
	Speaker of the Year			700.00		
	AAAS Representative			1,000.00		
	Web Site Development			2,668.50		
	Library Operations			1,057.74		
	Operating Fund Total	28,440.54	27,313.67	25,477.43	30,276.78	
RES	STRICTED FUNDS					
	Proceedings	14,848.27	18,799.03	18,473.83	15,173.47	
	Publications	10,742.21	23,045.33	37,356.93	(3,569.39)	
*	Research Grants	13,249.49	88,415.61	84,683.97	16,981.13	
	Lilly Library	6,578.44	0.00	0.00	6,578.44	
	Welch Fund	8,364.47	0.00	500.00	7,864.47	
	Life Members Fund	9,795.25	1,000.00	0.00	10,795.25	
	Past Presidents Fund	9,578.39	1,000.00	1,000.00	9,578.39	
	Special Projects Nat. Heritage		7,500.00	7,500.00	0.00	
	Total Restricted Funds	73,156.52	139,759.97	149,514.73	63,401.76	
	Prepaid Dues	5,430.00	3,745.00	5,430.00	3,745.00	
TOTAL FUNDS 107,027.06 167,073.64 174,992.16 97,423				97,423.54		
FU	NDS ON DEPOSIT					
	Checking Account	4,811.51	174,595.25	176,365.61	3,041.15	
	Money Market Savings	90,017.83	75,728.42	84,000.00	81,746.25	
	Cert. of Deposit	12,197.72	438.42	0.00	12,636.14	
TO	TAL FUNDS DEPOSITED	107,027.06	250,762.09	260,365.61	97,423.54	
*	Provided 29 senior member grants	and 24 high sch	ool grants.			
AC.	ACADEMY FOUNDATION FUNDS					
	John S. Wright Fund Account	3,513,136.15			2,321,946.69	
	PIA Account	4,758,510.35			3,333,393.63	
	Academy Fund Account	256,565.66			246,535.43	
	Invested Income Account	652,938.19			620,159.26	
то	TAL FOUNDATION FUNDS	9,181,150.35			6,522,035.01	
Fou	Foundation Funded Used For:					
	Proceedings	9,662.83		Colul h. Figur		
	Research Grants	77,664.97	Edward L. Frazier			
	Publications	16,905.32		Treasurer		
	Special Project-Nat. Heritage	7,500.00				
	Total	111,733.12				

CONTENTS

Proceedings of the Indiana Academy of Science

Volume 118	Number 1	2009
The trophic status of Pr	Environment airie Creek Reservoir: Implications	for
resource manageme	nt by Jarka Popovičová and	1
watersheds of the U	S. Midwest by P. Vidon, M.A. Campb	ell and
	Botany	
Forest vegetation of the Indiana by David J.	Kokiwanee Nature Preserve, Wabas Hicks and Teresa M. Michaelis	h County, 22
	southern Indiana vascular plants III and Richard H. Maxwell	
Complex in Henry C	County, Indiana by Donald G. Ruch, min R. Hess and Kemuel S. Badger	
The vascular flora of Tu	rkey Run State Park, Parke County,	, Indiana
	Zoology	
Monitoring gypsy moth by Dale R. Weigel and	pheromone flake canopy through-fa Todd Dempsey	all 76
	cal cicadas (Brood XIII) in Indiana dae: <i>Magicicada</i> spp.) by Gene Krits	
Observations on periodica 2008 (Hemiptera: Cio	al cicadas (Brood XIV) in Indiana and cadidae: <i>Magicicada</i> spp.) by Gene K	d Ohio in Tritsky,
Mesocosm evaluation of	garet Noble and Roy Troutmanwestern mosquitofish impacts on no	orthern
Brant E. Fisher		88
	leer preferences for woody browse in Vakeland and Robert K. Swihart	
	Indiana Academy of Science	
O	2008	
Financial statement for 3	2008	106

INSTRUCTIONS TO AUTHORS

(revised May 2009)

General information.—Manuscripts and all correspondence should be sent to the Editor. To be eligible for publication in the *Proceedings* at least one author must be a member of the Academy. Submission of a manuscript to the Editor implies that it has not been sent to another publication, nor has it been published elsewhere. If it is accepted for publication in the *Proceedings*, it may not be republished without the written consent of the Academy.

All manuscripts are evaluated by referees. Manuscripts may be submitted by e-mail or on a CD, or you may submit three paper copies of the manuscript. Figures in hard copies should be approximately the size that they will be printed in the *Proceedings*. They may be photocopies. After the manuscript has been accepted, the author will be asked to submit a paper copy of the manuscript (the electronic version and one paper copy). Galley proofs will be sent to the primary author for approval and correction.

Voucher specimens and permits.—Voucher specimens of species used in scientific research should be deposited in a recognized scientific institution. Authors must indicate that the collection of specimens, especially threatened or endangered species, was authorized by the appropriate governmental organization. Those making identification of specimens should be identified.

Style.— Do not use right or full justification. Also, use a non-proportional font (e.g., Courier, but not Times Roman).

Running head.—The author's surname(s) and an abbreviated title should be typed all in capital letters and must not exceed 60 characters and spaces. The running head should be placed near the top of the title page.

Title page.—The title page should include (1) the title in capital letters, (2) each author's name and address, (3) the running head, and (4) the complete name, address, and telephone number, FAX number, and e-mail address of the author with whom proofs and correspondence should be exchanged.

Abstract.—All manuscripts have an abstract which should summarize the significant facts in the manuscript. The "ABSTRACT" heading in capital letters should be placed at the beginning of the first paragraph set off by a period. Use complete sentences, and limit the abstract to one paragraph and no more than 250 words.

Keywords.—Give 3–5 appropriate keywords. Text.—Double-space text, tables, legends, etc. throughout, printing on only one side of the page. Three categories of headings are used. The first category (METHODS, RESULTS, etc.) is typed in capitals, centered, and on a separate line. The second (lower) category of heading, in bold type, begins a paragraph with an indent and is separated from the text by a period and a dash. (This paragraph begins with an example of this heading.) The third heading category may or may not begin a paragraph, is italicized, and is followed by a colon. (The paragraph below is an example.) The metric system must be used unless quoting text or referencing collection data.

Citation of references in the text: Cite only papers already published or in press. Include within parentheses the surname of the author followed by the date of publication. A comma separates multiple citations by the same author(s) and a semicolon separates citations by different authors, e.g., (Smith 1990), (Jones 1988; Smith 1993), (Smith 1986, 1987; Smith & Jones 1989; Jones et al. 1990).

Conclusions.—Do not have a conclusions section. This information should be in either the abstract or the discussion.

Literature cited.—Use the following style, and include the full unabbreviated journal title. Repeat the name for multiple references by the same author. Note that book titles have the first letter of each word capitalized.

Walter, J. & B. Hallet. 1979. Geometry of former subglacial water channels and cavities. Journal of Glaciology 23:335–346.

Walter, J. 1992. The significance and complexity of communication in moths. Pp. 25–66, *In* Insect Communications: Mechanisms And Ecological Significance. (P.N. Work & J.S. Rivers, eds.). Princeton University Press. Princeton, New Jersey.

Footnotes.—Footnotes are permitted only on the first printed page to indicate current address or other information concerning the author. These are placed together on a separate page at the end of the manuscript. Tables and figures may not have footnotes.

Tables.—These should be double-spaced, one table to a page and numbered consecutively. Most tables contain only three horizontal lines (see recent issues for examples). Do not use vertical lines, boxes, or shading. Include all pertinent information in the table legend at the top of the table (no footnotes).

Illustrations.—Figures submitted electronically should be at least 300 dpi. You may pre-submit illustrations to Allen Press to be certain that they meet publication standards. Go to http://verifig.allenpress.com. The password is allenpresscmyk. Figures should be arranged so that they fit (vertically and horizontally, including the legend) the printed journal page, either one column or two columns, with a minimum of wasted space. When reductions are to be made by the printer, pay particular attention to width of lines and size of lettering in line drawings. Multiple photos assembled into a single plate should be mounted with only a minimum of space separating them. In the case of multiple illustrations mounted together, each illustration must be numbered (1, 2, etc.) rather than given letter (a, b, etc.) designations. In paper manuscripts for review, photocopies are acceptable, and should be reduced to the size that the author prefers in the final publication. Color plates can be printed; but the author must assume the full cost, currently about \$600 per color plate.

Legends for illustrations should be placed together on the same page(s) and separate from the illustrations. Each plate must have only one legend, as indicated below:

Figures 1–4.—Right chelicerae of species of *Centruroides* from Timbuktu. 1. Dorsal view; 2. Prolateral view of moveable finger; 3. *Centruroides* holotype male; 4. *Centruroides* female. Scale = 1.0 mm.

Page charges and reprints.—There are no page charges, but at least one of the authors must be a member of the Academy. Corrections in proof pages must be restricted to printer's errors only; all other alterations will be charged to the author (currently \$3 per line).

Reprints are available only through the Allen Press and should be ordered (with payment) when the author receives the proof pages.