

# THE OHIO JOURNAL OF SCIENCE

JULY, 1937

## TABLE OF CONTENTS

Report of the Forty-seventh Annual Meeting of the Ohio Academy of Science.....	<i>William H. Alexander</i>	201
Grants in Aid of Research.....		247
Leeches of Southeastern Missouri.....	<i>Marvin C. Meyer</i>	248
Insect Hosts and Nymphal Development of <i>Podisus maculiventris</i> Say and <i>Perillus bioculatus</i> F. (Hemiptera, Pentatomidae), <i>B. J. Landis</i>		252
Additions to the Revised Catalog of Ohio Vascular Plants, V. <i>John H. Schaffner</i>		260
Two New Species of <i>Osbornellus</i> , <i>Dwight M. DeLong and Lawrence Beery</i>		266
Book Notices.....		251, 259, 265

PUBLISHED AT COLUMBUS, OHIO, BY THE

OHIO STATE UNIVERSITY

and the

OHIO ACADEMY OF SCIENCE

*Issued Bi-monthly, January to December (six numbers)*

*Entered at the Post-Office in Columbus, Ohio, as second-class matter*

# THE OHIO JOURNAL OF SCIENCE

## EDITORIAL STAFF

LAURENCE H. SNYDER.....	Editor-in-Chief
BERNARD S. MEYER.....	Business Manager
J. B. PARK.....	Agronomy
R. A. KNOUFF.....	Anatomy
L. H. TIFFANY.....	Botany
R. C. BURRELL.....	Chemistry
E. LUCY BRAUN.....	Ecology
F. C. WAITE.....	Embryology
G. D. HUBBARD.....	Geography
J. ERNEST CARMAN.....	Geology
A. F. FOERSTE.....	Paleontology
C. W. JARVIS.....	Physics
F. A. HITCHCOCK.....	Physiology
J. P. PORTER.....	Psychology
E. R. HAYHURST.....	Public Health
R. V. BANGHAM.....	Zoology

## ADMINISTRATIVE BOARD

### For Ohio State University

F. C. BLAKE  
E. N. TRANSEAU

### For Ohio Academy of Science

E. L. RICE  
C. G. SHATZER

## THE OHIO JOURNAL OF SCIENCE

Is published jointly by the Ohio State University and the Ohio Academy of Science.

**MANUSCRIPTS.** Preference will be given to original manuscripts pertaining to Ohio Science. Articles covering not more than fifteen to twenty pages of the JOURNAL are preferred, although longer articles may be printed. Contributors need not be associated with either the Ohio State University or the Ohio Academy of Science, nor need their contributions deal with the State of Ohio. Manuscripts are subject to the approval of the editor.

**ILLUSTRATIONS.** When illustrations form part of an article they should preferably accompany the manuscript. If their size does not make this convenient, they should be sent in a separate package properly labeled as to the article for which they are intended. Either half-tones or zinc etchings can be published, half the cost of the cuts being borne by the contributor. They are made under the supervision of the JOURNAL and a bill is then rendered by the JOURNAL to the contributor. All illustrations should be made with a view to having them appear within the limits of the printed form.

**PROOF.** Galley proof will be sent to contributors. It should be returned promptly in order to avoid any disappointment in the matter of publication. Care should be taken to furnish a correct mailing address. The JOURNAL will not assume responsibility for loss of manuscript or proof in the mails.

**REPRINTS.** A price list for reprints and an order form is sent with proof. This should be returned with the proof. No reprints are furnished free of charge. Shipments will be made upon payment of bills rendered for reprints and cuts.

**SUBSCRIPTIONS.** The Annual subscription is \$2.00, (foreign countries, \$2.50). Single numbers, 50 cents. One volume appears each year and contains six numbers.

By special arrangement with the OHIO ACADEMY OF SCIENCE, the OHIO JOURNAL OF SCIENCE is sent without additional expense to all members of the ACADEMY who are not in arrears for annual dues.

The first fifteen volumes of the old OHIO NATURALIST may be obtained at \$1.00 per volume.

**MAILING ADDRESS.** All manuscripts, illustrations, proofs and correspondence dealing with editorial matters, should be addressed to DR. LAURENCE H. SNYDER, Botany and Zoology Building, Ohio State University, Columbus, Ohio.

All remittances, correspondence dealing with subscriptions, reprints and other business matters should be addressed to DR. BERNARD S. MEYER, Botany and Zoology Building, Ohio State University, Columbus, Ohio. Failure to receive any number of the JOURNAL must be reported within three months of date of issue if claim is to be recognized.

# THE OHIO JOURNAL OF SCIENCE

VOL. XXXVII

JULY, 1937

No. 4

ANNUAL REPORT  
OF THE  
OHIO ACADEMY OF SCIENCE  
Forty-seventh Meeting  
1937

## TABLE OF CONTENTS

	PAGE
OFFICERS AND COMMITTEEMEN FOR 1937-1938.....	200
REPORT OF THE FORTY-SEVENTH ANNUAL MEETING.....	201
Introductory.....	201
Minutes of the Business Session.....	202
Scientific Papers, List of.....	206
Reports of Officers:	
Secretary.....	216
Treasurer.....	217
Report of Auditor.....	217
Report of Committees:	
Preliminary Committee on 50th Anniversary of the Ohio Academy of Science.....	219
Executive.....	222
Library.....	223
Joint Administrative Board of Ohio Journal of Science.....	224
State Parks and Conservation.....	224
Save Outdoor Ohio Committee.....	234
Election of Fellows.....	235
Trustees of Research Fund.....	235
Membership.....	236
Nominating.....	237
Necrology.....	238
Resolutions.....	239
PRESIDENTIAL ADDRESS—Charles Austin Doan.....	240

## PUBLICATION COMMITTEE

E. L. Rice, *Chairman*

F. C. Dockeray

Grace A. Stewart

THE OHIO ACADEMY OF SCIENCE

Organized 1891 Incorporated 1892  
 Affiliated with the American Association for the Advancement of Science

OFFICERS AND COMMITTEES FOR 1937-1938

*President*

CHARLES G. SHATZER

*Vice-Presidents*

- |   |   |
|---|---|
| A. <i>Zoology</i> : WARREN SPENCER            | E. <i>Psychology</i> : HAROLD E. BURTT                |
| B. <i>Botany</i> : RAYMOND A. DOBBINS         | F. <i>Physics and Astronomy</i> :<br>DAYTON C. MILLER |
| C. <i>Geology</i> : JOHN L. RICH              | G. <i>Geography</i> : FRANK J. WRIGHT                 |
| D. <i>Medical Sciences</i> : BRUCE K. WISEMAN | H. <i>Chemistry</i> : W. CONRAD FERNELIUS             |

*Secretary*

WILLIAM H. ALEXANDER

*Treasurer*

EUGENE VAN CLEEF

*Executive Committee*

*Ex-Officio*: CHARLES G. SHATZER, WM. H. ALEXANDER, EUGENE VAN CLEEF  
*Elective*: CHARLES A. DOAN, A. W. LINDSEY

*Board of Trustees*

- |   |      |
|---|------|
| HERBERT OSBORN, <i>Chairman</i> , term expires..... | 1938 |
| WILLIAM LLOYD EVANS, term expires.....              | 1939 |
| JAMES P. PORTER, term expires.....                  | 1940 |

*Committee on Publications*

- |   |      |
|---|------|
| EDWARD L. RICE, <i>Chairman</i> , term expires..... | 1938 |
| F. C. DOCKERAY, term expires.....                   | 1938 |
| GRACE A. STEWART, term expires.....                 | 1938 |

*Library Committee*

- MRS. ETHEL M. MILLER, *Chairman*,  
 In charge of Academy Exchanges and Publications
- |                                   |      |
|-----------------------------------|------|
| F. O. GROVE, term expires.....    | 1938 |
| W. H. SHIDELER, term expires..... | 1939 |
| L. B. WALTON, term expires.....   | 1940 |

*Committee on State Parks and Conservation*

- |   |      |
|---|------|
| EDWARD S. THOMAS, <i>Chairman</i> , term expires..... | 1940 |
| G. W. CONREY, term expires.....                       | 1938 |
| E. L. WICKLIFF, term expires.....                     | 1938 |
| ARTHUR T. EVANS, term expires.....                    | 1938 |
| EMERY R. HAYHURST, term expires.....                  | 1939 |
| EDMUND SECREST, term expires.....                     | 1939 |
| L. E. HICKS, term expires.....                        | 1939 |
| F. H. KRECKER, term expires.....                      | 1940 |
| W. E. STOUT, term expires.....                        | 1940 |

*Academy Representatives on the Joint Administrative Board,  
 Ohio Journal of Science*

- |                                   |      |
|-----------------------------------|------|
| EDWARD L. RICE, term expires..... | 1939 |
| C. G. SHATZER, term expires.....  | 1938 |

*Nominating Committee for 1938*

- |                  |                |
|------------------|----------------|
| A. A. W. LINDSEY | E. G. C. MYERS |
| B. C. E. O'NEAL  | F. G. E. OWEN  |
| C. FRED FOREMAN  | G. R. B. FROST |
| D. R. A. KNOUFF  | H. C. E. BOORD |