

SELYSIA

A NEWS LETTER OF ODONATOLOGY

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ODONATA COLLECTIONS

Information on Collections, as compiled from the questionnaires distributed, Nov. 15, 1963, as supplement to Vol. 1, #2, will be summarized from time to time. Data on three institutional collections are given in this issue.

The Odonata Collection at Cornell University

Ithaca, N.Y.

By Mrs. Alice S. Dietrich

Dr. James G. Needham spent the major part of his working years at Cornell and as most of his work was on Odonata, the collection is large and valuable.

Physically the collection consists of 142 Cornell sized drawers of Nearctic material and 85 drawers of exotic material. Except in a few instances these specimens are in cellophane envelopes and each drawer contains from 40 to 160 specimens. There are three cabinets of alcoholic material, approximately 10,000 4-dram vials. Also there are 160 slide trays.

The types at Cornell are predominately those of Needham. Of these 18 are North American, 45 are Chinese, 20 are Neotropical 2 are from other zones. Needham and Gyger's Philippine types number 40. Types of other authors are Borror-1, Butler-2, Calvert-1, Ferguson-1 Westfall-3, Williamson-1. Beside the holotypes there are many paratypes of various authors.

The collection is nearly complete for the Nearctic region, the Chinese and Philippine areas are well represented, and the Neotropical collection is only partially representative.

The arrangement of the collection was done by Mrs. Alice Dietrich and is as follows: Nearctic - (Anisoptera) according to 1955-A manual of the Dragonflies of North America, Needham and Westfall; (Zygoptera) - according to 1929, A Handbook of the Dragonflies of North America, Needham and Heywood. Exotic - according to 1890, A Synonymic Catalogue of the Neuroptera Odonata or Dragonflies Wm. F. Kirby.

The curator of the Museum is Dr. L. L. Pechuman to whom any requests should be addressed.

The policy is to lend specimens to responsible investigators. Type material is loaned only under special circumstances.

Odonata of the "National Museum Invertebrate Collections" of the National Museum, Bulawayo Southern Rhodesia

by

Elliot Pinhey, Keeper of the Department of Invertebrate Zoology

The dragonfly collection has advanced mainly in recent years since the advent of the Keeper, one of whose interests was in Odonata. Previous to 1955 the collection of Odonata was, in fact, mainly a small representative Rhodesian Collection, with a few species donated from other territories. The Keeper, who had worked previously in other Museums in Africa, was fortunate in obtaining much outside assistance in building up the collection from all parts of Africa.

Expeditions, both official and private have added considerably to this material. Non-Ethiopian species, however, obtained
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SELYSIA

A Newsletter of Odonatology

MEETING OF ODONATOLOGISTS AT LONDON

Dr. Paul Freeman, Organising Secretary of the XIIth International Congress of Entomology has very kindly agreed to schedule a meeting for workers on the Odonata during the meeting in London, July 8-16.

In reply to my inquiry concerning such a meeting, Doctor Freeman has written:

"Macan has arranged a meeting of workers on Trichoptera on Friday, 10th July, and another for workers on Ephemeroptera on Tuesday, 14th July. There are big receptions on the two Wednesday and the Monday, leaving only Thursday the 9th completely clear for you.

I am accordingly booking you the Council Room of the Royal Entomological Society for this date."

I shall look forward to seeing as many of those interested in the Odonata in anyway as can be in London on July 9th. I hope to renew my acquaintance with all those whom I met in Vienna and elsewhere in Europe during my 1960 visit, and to meet many others whom I have not met personally.

No formal program is planned. Each one in attendance will have an opportunity to tell of his work, or to present problems of nomenclature, classification, bibliography, ethology, ecology, or anything else relating to the Odonata, which he would like to have discussed. I shall be glad to know in advance if anyone expects to present material which would require the use of a projector (for 2"x2" slides); if I am so informed I shall attempt to arrange for a projector. Also, advance information of any subject which you wish to present for general discussion might be of some value to me in planning the meeting. However, anyone with any interest in the Odonata will be welcome at the meeting, whether or not he has anything to present for discussion.

As I expect to spend the greater part of the summer in Europe, mail addressed to me here must reach Lafayette before June 4 or I may not see it until late August. In the meantime, I may be addressed in care of the American Express, 6 Haymarket Street, London S.W.1, or in care of Mr. D. E. Kimmins, Entomology Department, British Museum (Natural History), Cromwell Road, London, S.W.7

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by

B. Elwood Montgomery

Issued at intervals
as available news and information warrant

This newsletter is designed to disseminate facts and news about the activities of Odonatologists and Odonatology. It is not intended as a journal nor an organ for the publication of articles or technical papers. The name is that of the "Father of Odonatology" Baron Edmond de Selys Longchamps.

As I prepare the first issue of the second year of Selysia I am most grateful for the expressions of support for my efforts to provide a means of communication for those interested in the Odonata. I appreciate the many letters, publications, specimens, even entire collections (see page 4) which have come to me as a result of this endeavor. I have been very neglectful in acknowledging these. Let me say many, many thanks to all of you. On another page I have listed the names of everyone to whom Selysia has been sent; those who have responded in any manner have their names underlined. If you have sent me something or have tried to communicate with me in any way and your name is not underlined, please write me.

I am exceedingly pleased that Selysia has been chosen as an organ to assist in two projects mentioned elsewhere in this issue -- the exchange of translations of papers on the Odonata and the assembling of ecological data on American species of the order. I would like to urge as wide a participation in these projects as possible. I intend to join in both.

National Museum Collections
(continued from page 1)

largely by exchange, are retained only for comparative purposes and reference. In other insect orders emphasis is also on Ethiopian species, but, unlike Odonata, non-Ethiopian examples are used more for exhibition than for comparative and research collections.

The collection includes 119 holo- and allotypes, plus a number of paratypes. The types are mostly those of species described by Pinhey, but includes paratypes from Balinsky, Buchholz, Tervueren, etc.

The Ethiopian collection is moderately complete except in some Malgassian genera; this collection is pinned and arranged in 136 drawers, with some material in spirit. Duplicate and non-Ethiopian collections are preserved in papers.

Types of Ethiopian species are listed in Pinhey's "A Descriptive Catalogue of the Odonata of the African Continent (up to December 1959)" [this gives the location of the types of all Ethiopian species whether at Bulawayo, or in other museums. BEM]

Academy of Sciences of the Armenian S.S.R.,
at Erevan

By N. N. Akramowski

The Odonata collection of the Zoological Institute of the Academy of Sciences of the Armenian S.S.R., is in charge of Nikolai N. Akramowski, senior scientific worker. It includes collections by N.N. Akramowski, and the late director of the "Museum Armeniacum", A. B. Schelkownikow. It contains more than 800 specimens (54 species) including 51 of the 52 species known from the Armenian S.S.R. Types of two sub-species of Akramowski are included. A few of the most recent collections (not more than 10%) are unmounted in layers of wadding, the remainder are pinned. The collection in 1948 was described by Akramowski in his paper of that date. Pinned material may be studied only at the Museum.

ECOLOGICAL DATA POOL

The increasing use of Odonata for ecological investigations has in part produced the

recent inauguration of Selysia and its distribution to readers over a wide part of the U.S. It is possible that these readers may in time assemble a body of ecological data hardly possible through the efforts of one or a few workers. At present we have only general notions of the adult flight seasons from north to south, lower to higher elevations, and one habitat type to another.

If observations from scattered localities were pooled into a common body, this information could provide very desirable background material when outlining procedures for an ecological study. Cumulative results of all observers could be made available to any investigator and the value of such data should encourage an increasing contribution to the data pool.

Observation format may take several styles and the following is suggested.
Species: Locality:
Habitat type: (Lake, Pond, River Stream)
Approx. elevation above sea level:
Dates:

1. First observation of adults for a given flight season
 2. Last observation for a given season
- Numbers:
1. Gradual increase and decrease in adults
 2. Explosive increase in adult numbers
 3. Otherwise

Naturally these observations are qualitative but should nevertheless provide a better picture of events over a wider geographical area than presently exists.

In an effort to initiate this activity all biologists having an opportunity to observe part or all of the above items are invited to submit their notes. These communications will be assembled by species in the above tabulation as received. Memographed sheets prepared in the above style will be mailed to any one requesting them for ease of reporting observations. Such sheets can be obtained through Clifford Johnson on request.

A summary on any species, as data accumulate, would be forwarded to any investigator on request to C. Johnson. Observations may be sent to Dr. B. Elwood Montgomery, Department of Entomology, Purdue University Lafayette, Indiana or directly to Dr. Clifford Johnson, NMIMT, Socorro, New Mexico. Should the response to this proposal be encouraging, other types of data could be requested.

EXCHANGE OF TRANSLATIONS

1. A central pool of all available translations of articles dealing with the Odonata is proposed. Translations from any language into any other are acceptable. Dr. George H. Bick, Saint Mary's College, Notre Dame, Indiana, U.S.A., will receive and maintain the translations, and handle copying and mailing as described below.

2. Any individual wishing to participate must submit to Dr. Bick at least one translation, not already in the pool as listed under #4 and consisting of a minimum of five double spaced pages on 8.5 x 11 paper. A ribbon copy typed on one side only to be retained in the central pool is required. The translator's name must show in parentheses after the citation.

3. Only individuals submitting translations are eligible for the service.

4. A list of all translations in the pool, including the number of pages in the translation, will be circulated in Selysia.

5. Each participant (anyone submitting a translation to the pool) is entitled to a Xerox copy of all available translations at a cost of 7 cents per page of translation to cover cost of copying and mailing. Payment is cash in advance based on the number of typed pages as announced.

Translations now available

1. Buchholtz, Christiane. 1956. Eine analyse des paarungsverhaltens und der dabel wirkenden auslöser bei den libellen Platychnemis pennipes Pall. und Pl. dealbata Klug. Zeit. Tierpsych., 13:13-25. (15 translated pages, George H. Bick.)

2. Buchholz, Karl. 1950. Zur paarung und eiablage der Agrioninen. Bonn. zool. Beit. 2/4: 262-275. (20 translated pages, George H. Bick)

3. Münchberg, Paul. Vergleichende Untersuchungen über die Atmungsintensität der Zygopteren-Larven. Beit. Ent., 12(3/4): 243-270; pp. 248-253, (methods) only in translation. (5 translated pages, Herwiga Blin).

4. Racenis, J. 1958. Los Odonatos Neotropicales en la coleccion de la Facultad de Agronomia de la Universidad Central de Venezuela. (Acanthagrion vidua Selys and A. luteum descriptions and notes only). Act. biol. venez., 2(19): 183-226, pp. 183-190 only in translation. (5 translated pages, (M. P. Russell)).

5. Santos and Machado. 1961. Contribuicao ao conhecimento do genero Chalcopteryx Selys, 1853, com a descricao de uma nova especie. Bol. Mus. Goeldi, Zool., 24: 17 pp. (8 translated pages, Alberto Veiga).

PERSONAL

We now have five people at Purdue working on the Odonata. Dr. Jerry Macklin who worked out the life histories of five species from egg to adult for his Ph.D. thesis investigations, is continuing his work on rearing local species. We consider this very important as the life histories - that is, the descriptions of all instars - of not more than 12 American species have been published. We have been unable to determine the instar (and also the species) of many naiads used in our studies of the effects of photoperiod and temperature upon growth rates; even in the species of which the life histories have been published we find the available information insufficient for the determination of the instar of individual naiads.

Daniel Sreenivasam, a graduate student is making a study of the respiratory system of Erythemis simplicicollis (Say). He expects to trace out this system in each stage from embryo to adult.

Ling Chu (Chen) Tai another graduate student is beginning "A Biosystematic Study of the Genus Sympetrum" based chiefly but not limited to the American species. She is using not only conventional morphological methods, but also ecological, ethological and developmental characteristics. We shall be glad to have material, both immature and adult of all species of the genus, either in exchange or on loan, for her studies. She would like to have, particularly any available series of exuvia of all instars of any specimen reared from egg to adult. Such material would provide a basis for the study of specific growth rate characteristics.

William Lease, an undergraduate student, is investigating the seasonal life history of E. simplicicollis, by tabulating the proportions of each instar in each of the collections of the species which is made throughout the year, and by rearing the species under controlled conditions. By the use of characters described by Dr. Bick and additional ones he has found in our reared material he is able to easily identify any naiad in any of the last six instars; but we do not yet know how constant the total number of instars may be.

Because of time and space limitations the third portion of the Directory of Workers, planned for this issue has been postponed. In the meantime a list of those to whom Selysia has been mailed is given below. The list includes names from my correspondence files, those suggested by other workers and names of all who have requested Selysia since the first issue was mailed. It is neither complete nor accurate and I shall be very glad to receive information of anyone who should be added to the list. In particular, I have made up lists of names and addresses by countries of those to be included in the Directory, and I shall be very glad to send any of these country lists to anyone who is willing to check them.

As the list may include individuals who are not interested, I shall drop the names of all from whom I have had no communication before the next issue is prepared, probably in September. The names of those from whom I have received any sort of acknowledgement are underlined.

The name's of those who have been reported to me as deceased are indicated by a cross (X). The names of those whose copies of Selysia were returned are indicated by -r. As the addresses which I used for these are wrong I shall be very glad to have the correct address of anyone whose name is so marked.

<u>Abro</u>	<u>Castellani</u>	<u>Geijskes</u>	<u>Kuhlmann</u>	<u>Pinhey</u>	<u>Svihla</u>
<u>Adamovic</u>	<u>Chopard</u>	<u>Gibbs</u>	<u>Kyle</u>	<u>Pinniger</u>	<u>Tabacaru</u>
<u>Aggarwal</u>	<u>Chujo</u>	<u>Gloyd</u>	<u>Laidlaw</u>	<u>Popova</u>	<u>Tai</u>
<u>Aguesse</u>	<u>Chutter</u>	<u>Gortler</u>	<u>LaRivers</u>	<u>Por</u>	<u>Taketo</u>
<u>Ahrens</u>	<u>Compte</u>	<u>Gower</u>	<u>Larsen</u>	<u>Prenn</u>	<u>Taylor</u>
<u>Akramowski</u>	<u>Conci</u>	<u>r-Grabeau</u>	<u>Lease</u>	<u>Price</u>	<u>Teyrovsky</u>
<u>Albright</u>	<u>Consiglio</u>	<u>Grieve</u>	<u>Lederer</u>	<u>r-Pritchard, A.E.</u>	<u>Tiensuu</u>
<u>Alrutz</u>	<u>Cook</u>	<u>Groos</u>	<u>Leonard</u>	<u>Pritchard, G.</u>	<u>Tinkham</u>
<u>Alward</u>	<u>Corbet</u>	<u>Gupta</u>	<u>Leth</u>	<u>Proese</u>	<u>Tjonneland</u>
<u>Ander</u>	<u>Cowley</u>	<u>Hammond</u>	<u>Lieftinck</u>	<u>Racenis</u>	<u>Tomantera</u>
<u>Ando</u>	<u>Cross</u>	<u>Harbison</u>	<u>Lindberg</u>	<u>r-Raff</u>	<u>Trogdon</u>
<u>Andoh</u>	<u>Cruden</u>	<u>Harden</u>	<u>Longfield</u>	<u>Ratcliffe</u>	<u>Ujhelyi</u>
<u>Angeles</u>	<u>Cumming</u>	<u>Harker</u>	<u>Lutz</u>	<u>Real</u>	<u>Urbanski</u>
<u>Armstrong</u>	<u>Pruess (Currie)</u>	<u>Hess</u>	<u>Macan</u>	<u>Richard</u>	<u>Valleta</u>
<u>Asahina</u>	<u>Cuyler</u>	<u>Hertel</u>	<u>Machado</u>	<u>Ries</u>	<u>Walker</u>
<u>Attlee</u>	<u>Dasgupta</u>	<u>Hintz</u>	<u>Mani</u>	<u>Robert, A.</u>	<u>Watson, Mrs.</u>
<u>Baba</u>	<u>Dehrange</u>	<u>Hirose</u>	<u>Nakauchi</u>	<u>Robert, P.A.</u>	<u>Ben</u>
<u>Baijal</u>	<u>Dietrich</u>	<u>Hirata</u>	<u>Nielsen</u>	<u>Rosenbohm</u>	<u>Watson, J.A.I.</u>
<u>Balinsky</u>	<u>Dobson</u>	<u>Hobby</u>	<u>Macklin</u>	<u>Sage</u>	<u>Westfall</u>
<u>Barnard</u>	<u>Donnelly</u>	<u>Hodgkin</u>	<u>MacNeill</u>	<u>St. Quentin</u>	<u>Whellen</u>
<u>Beatty</u>	<u>Eda</u>	<u>Hornuff</u>	<u>Martin</u>	<u>Saitoh</u>	<u>White</u>
<u>Beatty</u>	<u>van Eldik</u>	<u>Hodges</u>	<u>McMahan</u>	<u>Santos</u>	<u>Wighton</u>
<u>Belyshev</u>	<u>Eller</u>	<u>Inoue</u>	<u>Michael</u>	<u>Sawano</u>	<u>Wise</u>
<u>Benitz</u>	<u>Eriksen</u>	<u>Ishida</u>	<u>Mitchell</u>	<u>Schiemenz</u>	<u>Williams</u>
<u>Berly</u>	<u>Etcheverry</u>	<u>Ito</u>	<u>Moore, B.P.</u>	<u>Schoffeniels</u>	<u>Wolfe</u>
<u>Berzins</u>	<u>Etfman</u>	<u>Jacobs</u>	<u>Moore N.W.</u>	<u>Schoffner</u>	<u>Yamamoto</u>
<u>Bilek</u>	<u>Faris</u>	<u>Jenner</u>	<u>Muller</u>	<u>Schouteden</u>	<u>Zahner</u>
<u>Bird</u>	<u>Flint</u>	<u>Johnson</u>	<u>Musser</u>	<u>r-Schumann</u>	<u>Belle</u>
<u>Boehms</u>	<u>Flower</u>	<u>Jurzitza</u>	<u>Naumann</u>	<u>Seidel</u>	<u>r-Chen</u>
<u>Bick</u>	<u>Ford</u>	<u>Kelner-Pillault</u>	<u>O'Farrell</u>	<u>Senguelia</u>	<u>Gloger</u>
<u>Borrer</u>	<u>French</u>	<u>Kauta</u>	<u>Okada</u>	<u>Smith</u>	<u>Gorodkov</u>
<u>Brinck</u>	<u>Fudakowski</u>	<u>Kimmins</u>	<u>Oksala</u>	<u>Somme</u>	<u>Harwood</u>
<u>Buchholtz</u>	<u>Gambles</u>	<u>Klimaszewska</u>	<u>Okumura</u>	<u>Spuris</u>	<u>Heymer</u>
<u>Buchholz</u>	<u>Garcia-Diaz</u>	<u>Klots</u>	<u>Omura</u>	<u>Sreenivasam</u>	<u>Munchberg</u>
<u>Byers</u>	<u>Gardner</u>	<u>Kormann</u>	<u>Pajunan</u>	<u>Steiner</u>	<u>Schmidt</u>
<u>Capra</u>	<u>Garman</u>	<u>Kormondy</u>	<u>Paulson</u>	<u>Steinmann</u>	<u>Turner</u>
<u>Carpentier</u>	<u>r-Gaunitz</u>	<u>Krieger</u>	<u>Perutik</u>	<u>r-Straub</u>	<u>Wenger</u>