



NEWS

of the LEPIDOPTERISTS' SOCIETY

No. 3 May/June 1986

EDITOR

June Preston

832 Sunset Dr.

Lawrence, KS 66044

U.S.A.

ASSOCIATE EDITORS

Art Director
Les Sielski
Ripples
Jo Brewer

1. Ken Philip
2. Jon Shepard
3. Bob Langston
4. Ray Stanford
5. Dick Rosche

Zone Coordinators

6. Ed Knudson
7. Ross Layberry
8. Les Ferge
9. Andy Beck
10. Dave Winter

11. J.C.E. Riotte
12. Eduardo Welling M.
13. Boyce Drummond



SAVING THE WESTERN NORTH AMERICAN POPULATION OF THE MIGRATORY MONARCH BUTTERFLY

Each fall the Monarchs (*Danaus plexippus*) of western North America migrate to coastal California to pass the winter. Clustering in groups ranging from a few individuals to hundreds of thousands in various species of trees from Mendocino County to as far south as Ensenada on Mexico's Baja California peninsula. The butterflies provide both a spectacular visual display and a challenge to scientists and conservationists. There are two populations of this butterfly in North America, each with distinct migratory routes and overwintering areas. The first, which spends the warm months of the year in eastern regions of Canada and the United States uses a path ("flyway") east of the Rocky Mountains to reach roosting sites in the mountains of central Mexico. The second, which is found in the southwest, the Great Basin, the Pacific Northwest and portions of western Canada, moves through the Pacific states to a limited number of sites located primarily along the coast of California.

The annual fall migration to a warmer climate protects the butterflies from northern winters. Monarchs are unable to tolerate frigid weather. The environmental conditions at the roost sites provide temperatures that are cool enough to keep them from using up internal fat reserves needed for the spring migration inland, yet warm enough to keep them from freezing. Relatively few localities in coastal California possess these requirements. Unfortunately, some of these sites have been eliminated and others are threatened with destruction due to urban development. A variety of events, primarily real estate and agricultural development, have destroyed overwintering sites in California. As houses, apartments and other structures have been built in a number of cluster areas, they have forced the Monarchs to abandon the sites. Other clusters have been eliminated when the roost trees were cleared and thinned for aesthetic reasons. The disappearance in both cases seems to be due to alterations in the precise climatic conditions required by the butterflies. Even though a number of sites are located on public land, such as military bases, nature reserves and federal, state and local parks, responsible officials are often unaware of overwintering populations. This is because the butterfly trees are occupied only in

the fall, winter and spring and even if they are present, the clusters may be overlooked.

The Monarch lives in many areas of the world and is in no danger of extinction as a species. However, both the eastern and western North American populations are extremely vulnerable to heavy loss because of their overwintering strategy. The phenomenon of the North American migration could be destroyed in the foreseeable future. In response to the threat of losing such a fascinating and awe-inspiring phenomenon, cooperative efforts involving Canadian, Mexican and U.S. organizations are underway to protect and manage the overwintering roosts of the Monarch. One such group, The Monarch Project, working in close association with the Santa Barbara Museum of Natural History, is currently active in this endeavor in California.

The Monarch Project is working to conserve the western population of the Monarch by completing a three phase operation: first, location of all the roosting sites; second, determination of the basic requirements of the animals by detailed studies of their ecology and biology, and by tagging the butterflies; and finally, protection and management of the roosts. Monarch roosts are located by searching for suitable groves of trees in coastal areas or by following up on sightings reported by local residents. The first season of survey work in 1984 located some 220 cluster sites in California. The second year is currently underway and is adding to this list as well as verifying questionable records.

Ecological and biological data needed for conservation of the butterflies are being gathered through intensive investigations now. This work will allow assessment of changes in the health of the western North American population. One way data on the status of populations is being gathered is by tagging the butterflies. This system was developed and perfected by Dr. Fred Urquhart of Toronto, Canada. Late in November 1985 volunteers began attaching consecutively numbered papered tags to the Monarchs. The tags carry instructions to send the recovered butterflies to the Santa Barbara Museum of Natural History. There, the entomologists are plotting the distance the butterflies have traveled since they were tagged. The study will provide estimates of the sizes of many roosts and also how the Monarchs are moving through the region.

In California, various conservation techniques are available to protect Monarch cluster sites. The Monarch Project is supplying information to officials responsible for roosts on public land. For those sites on private holdings, easements and registration are being sought. A conservation easement is a legal process by which a landowner gives away the development rights to a piece of property by donation or sale to an appropriate organization, in this case The Monarch Project. The Monarch Project then holds title to the wildlife and other natural elements of the property enabling it to protect

the roost and allow scientists access for research. With registration, the landowner maintains title, but enters into a non-binding voluntary agreement with The Monarch Project to protect the butterfly roost. In return, The Monarch Project provides an annual ecological "checkup" on the health of the site, and a management plan if one is needed.

Volunteer assistance in tagging Monarchs in western North America (states and provinces west of the Great Plains) is badly needed this season. The data obtained from the butterflies will identify the pathways used by the migrating butterflies. This, in conjunction with the roost survey, will indicate "trouble spots" and allow The Monarch Project to maximize its conservation efforts. If you are interesting in tagging Monarchs, please write me and I will send you a kit of 25 tags, instructions and blank data sheets. You will be notified immediately if any of your tagged Monarchs are recovered.

Christopher D. Nagano, The Monarch Project
Entomology Section, Natural History Museum of LA Co.
900 Exposition Blvd, Los Angeles, California 90007

SOME FIELD OBSERVATIONS RE:

Pieris = Agtogetia virginienensis and Dentaria laciniata.

This is in response to Ross Layberry's note in the July/August 1984 issue of NEWS of the Lepidopterists' Society. Ross ponders the possible feeding segregation of P. virginienensis on Dentaria diphylla vs. Dentaria laciniata. He suggests that "D. diphylla seems to be the preferred food plant" in his Ontario locations. In northwestern Virginia, P. virginienensis is a common spring species. Dentaria diphylla, however, occurs only in the western counties of Virginia north to Rockingham County and has never been found in any of the seven counties where I have studied P. virginienensis. Instead, D. laciniata grows in almost every type of transition and carolinian zone woodland and its associate butterfly always seems to follow. Opler (Butterflies East of the Great Plains) states that "most often maple and beech are elements of these (P. virginienensis habitat) forests." Indeed, this was the habitat I was familiar with from the Great Lakes region. In northwestern Virginia there is very little rich, beech-maple forest. Instead, I find the butterflies to be common in oak-hickory, tulip tree-basswood forests and somewhat less commonly in floodplain forests dominated with box elder. In two colonies of tulip tree-basswood forests (Warren and Faquier Co.) I suspect that Dentaria heterophylla might be a food plant also, as this species is very common where many of the P. virginienensis occur.

There appear to be some nice problems to solve. Does Pieris virginienensis discriminate between the two species of Dentaria in the north? If it does discriminate in the north, does it do so in southern Virginia where D. laciniata and D. diphylla grow sympatrically. Wagner (Great Lakes Entomol 11:53-57) had indicated the morphological differences between the Great Lakes and southern Appalachians P. virginienensis populations. Possibly, they also exhibit distinctive feeding differences.

Robert C. Simpson
Lord Fairfax Community College
Middletown, Virginia

NATIONAL COUNCIL OF STATE GARDEN CLUBS, INC STRESSES BUTTERFLIES

Concerned with the fact that gardeners have been seeing fewer and fewer butterflies, the National Council of State Garden Clubs has added a new committee on Conservation and Preservation of Butterflies to work in conjunction with its existing Conservation committee. The study of Butterflies is now being encouraged in individual Garden Clubs throughout the country, with emphasis on their conservation and methods of attracting them to one's garden.

A NOTE OF THANKS

Now that the 1985 ZONE 8 ANNUAL FIELD SUMMARY is completed, I have decided to turn the responsibility over to someone else. During the 15 years that I have had this unique and interesting assignment, I have tried to give it my best by making it useful and interesting to all members. The task could not have been done without the cooperation of so many members, who took time to make a contribution. To those contributors who did make the effort, my sincere THANKS! I trust that you will continue to make contributions and cooperate with the new coordinator. Best wishes and "keep collecting"!!

M. C. Nielsen
3415 Overlea Dr.
Lansing, MI 48917

NEW ZONE 8 COORDINATOR

Les Ferge of Middleton, Wisconsin will be the new Zone 8 Coordinator for future season summaries. Les was recommended by his predecessor, and although primarily interested in Life History and distribution of Wisconsin Lepidoptera will, we are sure, lend his expertise in this field to balanced summary records from the nine other states in his zone.

RESEARCH GRANTS RECEIVED BY THE OHIO LEPIDOPTERISTS

The Ohio Lepidopterists have recently been the recipient of two grants from the Ohio Department of Natural Resources to implement research on Ohio Lepidoptera.

In 1983 legislation was passed which provided Ohioans with the choice of ear-marking some of their state tax money to a special account established solely to support non-game and endangered wildlife management. An astonishing total of \$488,249.00 was given by taxpayers to fund this project that year. Members of The Ohio Lepidopterists have been active in informing the Division of Wildlife of the need for learning more about Ohio's butterflies and moths.

The first cooperative research project with the Division of Natural Areas and Preserves was entitled "Evaluation of the status and habitat association of potentially endangered and threatened Lepidoptera in Ohio". This \$3,000 grant implemented a study of the current status of eight species of butterflies and moths: Lycaeides melissa samuelis, Speyeria idalia, Phyciodes batesi, Neonympha mitchellii, Acronicta albarufa, Catocala marmorata, Catocala pretiosa and Erythroecia hebardii. John Shuey, a graduate student at Ohio State University, will present a summary of the results of this study at the annual meeting of The Lepidopterists' Society in Ottawa. A final report, prepared by Dr. John Peacock, Grants Chairman of The Ohio Lepidopterists, was submitted to the state agency in March and the results will be presented in an appropriate scientific journal in the near future. Co-authors will be Eric Metzler, Reed Watkins, John Shuey, John Calhoun and David Iftner.

The second project is much larger in scope and is anticipated to extend over a period of at least five years. A total of \$9,950.00 has been requested for the first year. The study will involve a comprehensive survey of Ohio butterflies and moths and all members of The Ohio Lepidopterists are encouraged to participate. Members can help implement this project in two ways: (1) To inform Reed Watkins, 9258 Clio Road, Spring Valley, Ohio 45370 of their willingness to share records from their private collections and (2) To contact Reed and let him know that they wish to cooperate in conducting surveys near their homes and hopefully in areas where little or no collecting has previously been done. The collection of Lepidoptera in Ohio has never been coordinated and has largely been based upon the

interests and location of individual collectors. Very little, or no, collecting has been done in over 66 of the 88 Ohio counties. It is important therefore to develop an informational data base for the management of this non-game resource as well as to contribute to our knowledge of basic science. Reed Watkins is Chairman of The Ohio Lepidopterists Survey Committee.

The Ohio Lepidopterists has provided a means by which collectors in Ohio and neighboring states can meet to discuss common problems, learn biological techniques, share collecting experiences on field trips and to learn more about the Lepidoptera of Ohio, other states and other countries. As a result of this interaction between members, studies are underway in documenting the occurrence in Ohio of all of the butterfly families plus the Noctuidae, Geometridae, Sphingidae and Notodontidae.

Collectors wishing to learn more about this organization, or wishing to join, may write to Dr. David Iftner, 2161 Heatherfield Ave, Columbus, Ohio 43085. Dues are only \$5.00 each year. Next meeting in Dayton, Ohio in September. Field trip to Lake Katherine in June.

Roy W. Rings, President

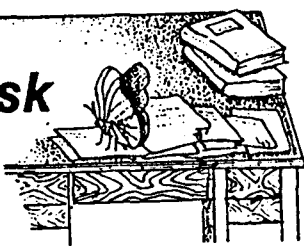
HISTORIC LEPIDOPTERA DATA DONATED TO THE OHIO LEPIDOPTERISTS

Ray W. Bracher of South Bend, Indiana has offered to donate to the Ohio Lepidopterists original notes and other data on the lepidoptera of Ohio compiled by Clement W. Baker. Baker, with his wife Alice and two children, lived in Waynesburg, Stark County, Ohio. For many years he studied the lepidoptera of the area and was termed "Ohios' dean of amateur lepidopterists" by a colleague in 1953. He helped organize the Northeastern Ohio Lepidopterists Society which later developed into the Neo-Naturalists' Society with several hundred members. In 1932, Austin H. Clark described *Speyeria aphrodite* ab. "bakeri" in his honor. Baker also possessed a large library of lepidoptera literature. Ultimately, his books and collection were donated to his alma mater, Mt. Union College in Alliance, Ohio. Ray Bracher, who met Baker many years ago through their mutual interests, describes him as "a genius who dedicated his life to being a lepidopterist". The Ohio Lepidopterists are very pleased to accept this material which will become an important source of Ohio lepidoptera information.

John V. Calhoun
6332 Ambleside Dr. Apt. C
Columbus, OH 43229

From The Editor's Desk

June Preston



The longest Season Summary in history is now behind us. I don't know whether being the longest is good or bad, but both my typist and I are glad it is done, and other things can take our attention. We trust there weren't too many errors that escaped us.

I hope that you will continue to send me items and photos for the NEWS and will be patient if you don't see your item in print immediately. Photographs should be black and white glossy prints at least 4 inches by 5 inches in size. The need to work in the frame of a multiple of 4 pages minus 1 often makes it necessary to shelve an item for a time because it is either too long or too short for the space available. Of course, all notices with dates that will soon pass are placed in the earliest issue possible and items for the Market Place

are printed in the earliest issue for which they meet the deadline. This issue and the next have deadlines only one month apart because NEWS #4 must go to the printer in mid-May before my husband and I take off for our 3 month summer collecting trip, including attendance at both the Annual Meeting and the Pacific Slope Meeting. In many portions of the United States the collecting season has already begun with some EARLY records already reported for some areas. Much of the midwest has had a very dry winter, warmer than usual, and an earlier than usual spring green-up. Let's hope it means that collecting will be good for everyone this year.

The following letter deserves a competent answer. I know that not all duplicating machines are the same and that some brands give better copies than others, so the answer may be a bit complex.

As always, the letter printed here expresses solely the opinion of its author and does not in any way reflect any policies of The Lepidopterists' Society.

Dear June:

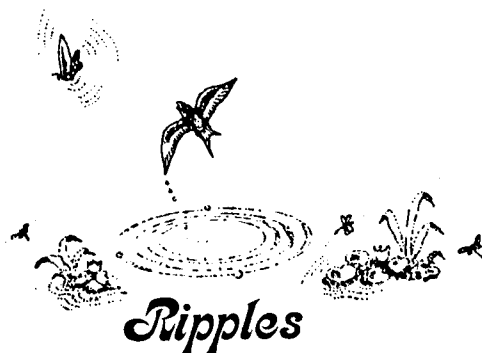
Ray Stanford's July 1985 article on reduction xerox specimen labels describes a practical approach to the production of neat, readable labels. The last sentence, "They last indefinitely.", deserves examination.

The usual connotation of that expression is that of lasting more or less forever. The dictionary definition, however is "unclear, vague, uncertain". When xerox paper is used for labels, the dictionary definition is probably closer to the mark.

The xerox paper available to me is sulfite paper made from wood pulp, with little or no rag content. The likelihood that labels made from it will begin to yellow and crumble after ten years or so is very high. When I tried to make labels this way after the Alberta meeting, I used light-weight card stock (which I use for printing labels with a Kelsey press) with a high rag content. When I used this stock for the last reduction printing, the xerox toner bled into the paper and left the print blurred and barely readable.

I should appreciate hearing how to use the xerox to produce long-lasting labels on paper that is built to last longer than the collector. They should last at least as long as the bugs, and that is centuries, not just a decade or so.

Dave Winter



Jo Brewer, Ed, 257 Common St, Dedham, MA 02026

Does lightening ever strike twice in the same place? Do tagged Monarchs from the same field ever turn up in Mexico, 1,500 miles from Toledo within a day of each other?

Yes, such things happen, but not very often. So add Doris Stifel and butterflies Nos. 48439 and 48564 to the list of rare repeats.

Mrs. Stifel was told by the University of Toronto that her Monarch No. 48439, tagged in September 1985, had been recovered in Mexico 1,500 miles from the place of tagging. This week she learned that No. 48546 had also been recovered. Both were ♀♀, and among 168 Monarchs released in the same field on the same day. They were retrieved nearly 200 miles apart.

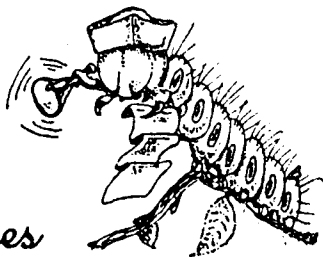
Mrs. Stifel believes that most of the 1,000 individuals she banded last year were migrating from Canada across Lake Erie, possibly from as far North as Hudson Bay. Excerpted: From The Blade, Toledo, Ohio Jan. 24, 1986. Sent by Mo Nielsen.

Dear Ripples,

Recently it was shown on a PBS T.V. program, how some larvae overcome their host plant's manufactured defensive toxin, either by quickly eating a circular section, thereby severing veins in the immediate area or, in later instars, severing the main vein to the whole leaf or leaflet. On several occasions during three seasons I have noted that the larvae of Shizura unicornis frequently eat a circular band, approx 2mm wide, from the outer layers of the leaf stalk that it is feeding on. This was observed on two host plants, both immature, Acer negundo and Tilia americana. It was also noted that foraging ants were not observed to cross over this band. Have there been any previous recorded examples of these or similar behaviors?

Mike Elliston
Winnipeg, Manitoba

Notices



MUSEUM CURATOR POSITION AVAILABLE

A full-time, 12 month non-tenure track appointment in the Mississippi Entomological Museum, Department of Entomology, Mississippi State University will be available July 1, 1986. Application deadline is June 1, 1986. The Museum Curator will be responsible for managing the research collection of the Mississippi Entomological Museum, which includes over 500,000 specimens with an annual increase exceeding 40,000 specimens.

Qualifications: B.S. or M.S. in Entomology or related area (Ph.D. applicants will not be considered); experience in collecting, preparing and curating a wide range of arthropods. Salary will be commensurate with experience and qualifications. Send application materials, including:

- A comprehensive professional resume;
- Transcripts of all post-secondary education; and
- At least 3 names of individuals who are familiar with applicant's qualifications and who can be contacted for recommendations,

to: Dr. Richard L. Brown, Director, Mississippi Entomological Museum, P. O. Drawer EM, Mississippi State, MS 39762. Phone (601) 325-2085. MISSISSIPPI STATE UNIVERSITY IS AN AA/EEO EMPLOYER

NEW MEMBERSHIP DIRECTORY IN PREPARATION

The #6 (November/December) issue of the NEWS will be devoted entirely to the biennial Membership Directory. The Subject Index to members' interests is a major feature of the Directory; this index is automatically compiled by computer from the narrative list of interests submitted by members. If you want your name listed under a particular subject heading, that heading must be included in your narrative list of interests. For example, John Doe's name would be listed under the headings Catocala, Distribution, Ecology (chemical), Foodplants, Noctuidae, Photography, and Taxonomy if his list of interests read (regardless of word order) "Ecology

(chemical), distribution, taxonomy, and foodplants of North American Noctuidae, esp. Catocala; photography." (Note that geographic terms are usually indexed only if they are outside the member's region of residence). For further details see the inside front cover of the 1984 Membership Directory; for an example of the absolute maximum size of an entry see the listing for McFarland, Noel, in the 1984 Directory. DEADLINE for additions, corrections, or changes in your list of interests for the 1986 Membership Directory is 15 October 1986. Please mail information to the Assistant Secretary, Julian P. Donahue, Natural History Museum, 900 Exposition Blvd., Los Angeles, CA 90007, U.S.A.

JOURNAL UPDATE FROM BILL MILLER, EDITOR

JOURNAL issues 3 and 4 of volume 39 (1985) went to the printer in early February. They should be appearing about the same time as this issue of the NEWS. The usual JOURNAL publication schedule should be restored by summer.

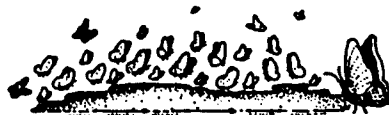
A large backlog of manuscripts has been cleared, and new submissions of articles, general notes, and book reviews are invited. Manuscript processing time has been sharply reduced, but each article and general note still receives two or more rigorous technical reviews before acceptance.

Manuscripts should be prepared in accordance with "Notice to Contributors" on the inside back cover of any recent JOURNAL issue. Material should be submitted in triplicate to: William E. Miller, Dept. of Entomology, University of Minnesota, St. Paul, MN 55108 U.S.A.



Research Notice

● **WANTED** - Information about Monarch butterflies marked in Mexico during the 1985/86 overwintering season. In the process of preparing a mark recapture study, approximately 32,000 butterflies were marked with different colored Marks-a-lots pens on the ventral surface of the discal cell of the hindwing (or near it) at two overwintering locations. If you recapture a Monarch so marked, please send the date and location of recapture and, if possible, the marked wing to William Calvert, 503 E. Mary St., Austin, Texas 78704. I will be pleased to share the results of this study with anyone interested.



Forthcoming Meetings

LAST CALL FOR OTTAWA, ONTARIO, CANADA

The 37th Annual meeting of The Lepidopterists' Society will be held over The Memorial Day Weekend, May 23-26, 1986 at Carleton University, Ottawa, Ontario, Canada. If you haven't already sent in your registration form, please notify Don Lafontaine immediately. Materials for those already registered were sent out in early April. Information can be obtained by writing to

Mr. Lafontaine at Biosystematics Research Institute, Agriculture Canada, Ottawa, Ontario K1A 0C6 Canada or phoning (613) 996-1665 days or (613) 225-1841 evenings. Donations for door prizes can be sent to Mr Lafontaine or brought to the meeting.

PACIFIC SLOPE SECTION MEETING

El Coronado Ranch on Turkey Creek on the West side of the Chiricahua Mtns of SE Arizona will be the site for the Aug 1-3, 1986 meeting of the Pacific Slope Section of The Society. Further information will be sent to all members with zip codes of 80000 or greater. Other interested persons should contact Julian Donahue, Natural History Museum of Los Angeles County, 900 Exposition Blvd, Los Angeles, California 90007 for additional information. Door prize donations can be brought to the meeting.

12th ANNUAL XERCES SOCIETY MEETING

The Xerces Society 12th Annual Meeting will be held from Wed evening, June 4th, until Sunday afternoon June 8th at Pilgrim Firs Conference Center on the Kitsap Peninsula across Puget Sound from Seattle. A registration fee of \$20 per person (if prepaid) will cover refreshments, program, entertainment and ancillary activities. A field trip fee of \$15 per person will cover costs of an all day trip to Hood Canal, Lake Cushman and the borders of Olympic National Park on Saturday, June 9. Accommodations range from private rooms at \$23.00/day per person or \$84.70 total to \$18.00/day per person for group cabins or \$44.70 total. This fee includes 4 nights lodging plus all meals from Thursday breakfast through Sunday breakfast. There will be a Northwest wine, ale and cheese tasting party preceeding the Saturday night banquet. On Friday evening an auction of butterfly-related "objets d'art" will be held to benefit the Xerces Society. Donations of such "objets d'art" are eagerly sought. For further information, including travel routes, ferry schedules and Seattle-Tacoma Airporter service to Pilgrim Firs, contact Meeting Chairman R.M. Pyle, Swede Park, 369 Loop Road, Gray's River, Washington 98621 or phone 206 465-2539.

NORTH AMERICAN BENTHOLOGICAL SOCIETY

The 34th Annual Meeting of the NABS is to be held in the Kansas Union, University of Kansas, Lawrence, Kansas from May 20 to 23, 1986. The theme will be Aquatic Systems in Desert and Prairie Biomes. In addition to field trips and a plenary session, two sessions will feature insects; one covering crane flies and the other the Hungerford Memorial Symposium on aquatic Hemiptera. For more details, contact Len Ferrington, Kansas Biological Survey, University of Kansas, Lawrence, Kansas 66045-2969 or phone (913) 864-4777.

New Members



BELL, ELIZABETH A.: 135 Palmetta Street, Santa Cruz, CA 95060.
BERG, OISTEIN: Bleikerasen 56, N-1370 Asker, NORWAY.
BRUNETTI, GIOVANNI: Via Montevettore 10, 60100 Ancona, ITALY.
CALLEGARI, MARIO C.: Apartado Postal 03-0150, Salamanca de Monterrico, Lima, PERU.
COMPRONI, ARNOLD, Sr.: 14804 Tulipland Avenue, Canyon Country, CA 91351.
COOK, PATRICIA H.: 1053 Stratford Lane, Bloomfield Hills, MI 48013.
COOK, ROBERT H., Jr.: 22 Lynwood Road, Lansdale, PA 19446

DeROLLER, CHARLES J.: 691 Gasberry Lane, Webster, NY 14580.
DION, YVES-PASCAL: 3 rue St.-Charles, Pont-Rouge, Quebec G0A 2X0, CANADA.
EARLEY, ALLISON: 420 Mes Street, Delta, CO 81416.
ELLERBY, SCOTT: 26467 8th Avenue South, Kent, WA 98032.
FLASPOHLER, RONALD: Room 232, Moore Hall, Western Michigan University, Kalamazoo, MI 49008.
FORNIERI, VINCENT T.: 1308 "C" Street, Elmont, NY 11003.
GILCHRIST, GEORGE W.: Program in Ecology, Box G, Brown University, Providence, RI 02912.
GONZALES, FERNANDO L.: 1825 West 44th Place, Apt. 402, Hialeah, FL 33012.
GREGORY, GARDINER E. (Dr.): Route #166, Box 259, North Castine, Orland, ME 04472.
GREGUS, FRANK: P.O. Box 303, West Milford, NJ 07480.
GUERINEAU, J. M.: Musee des Papillons, Foret de Chize Beauvoir, Beauvoir sur Niort, FRANCE.
HARTE, CHARLES R.: 714 Perth Avenue, Flossmoor, IL 60422.
HENSEN, WIENDERT: 65 Erosweg, Curacao, NETHERLANDS ANTILLES.
HODGINS, FRED: Great Lakes Biological Co., P.O. Box 132, Howell, MI 48843.
HOLSTEIN, CHETTY: 3513 - 200 Place SW, Lynnwood, WA 98036.
HORTON, DON: 963 North Allen Place, Seattle, WA 98103.
JOHNSON, NANCY: 116 Sunset, Longmont, CO 80501.
KING, BRUCE W.: 16 Main Street, Easthampton, MA 01027.
KING, HARRY: 875 South Jefferson Avenue, Mason, MI 48854.
MARTINEZ BAZAN, VICTOR M.: Apartado #104, Tingo Maria, Huanuco, PERU.
MARTINS, FRANK: 275 Ormond Drive, Unit 16, Oshawa, Ontario L1K 1S1, CANADA.
MOINIER, CLAUDE: 7 rue Edmond Gondinet, 75013 Paris, FRANCE.
NITTMANN, R. SHAWN: 9350 North 67th Avenue, #114, Glendale, AZ 85302.
PARKS, ROBERT P., Jr.: 10335 Restful Court, Santee, CA 92071.
PORTER, ADAM H.: Department of Zoology, University of California, Davis, CA 95616.
RICHERSON, JIM: 501 E. Street, Laport, IN 46350.
ROBINSON, PHILLIP: 11037 Clare Street, Whittier, CA 90601.
ROYER, RONALD ALLAN (Ph.D.): Division of Science, Minot State College, Minot, ND 58701.
SIERRA, CHUCK: P.O. Box 1714, Sierra Vista, AZ 85636.
WHITE, NIKKI: 52 Margerum Road, Trenton, NJ 08620.

Address Changes



ALLEN, ROBERT L.: 27081 Segovia Circle, Mission Viejo, CA 92691.
ASBRY, RODERICK: 1961 Greensboro Drive, Wheaton, IL 60187.
BRANSKY, STEVEN C.: Northland College, Ashland, WI 54806.
BRUYEA, GUY P.: 1930-383 Encinitas Road, San Marcos, CA 92069.
BUCKETT, JOHN S.: 2379 Santa Rosa Avenue, c/o B. Buckett, Santa Rosa, CA 95407-6213.
CALHOUN, JOHN V.: 6332-C Ambleside Drive, Columbus, OH 43229.
CLARK, DAVID G. FRITZ: 8315 Old Georgetown Road, Bethesda, MD 20814-1415.
FARBER, CHUCK: 2467 Aglen Street, St. Paul, MN 55113-3309.
FIELD, WILLIAM D.: 2944 Rosemary Lane, Falls Church, VA 22042.
FROHMBERG, ERIC: 8214 Houston Court, Apt. 1, Takoma Park, MD 20912.
GALI, FRANK: 10040 S.W. 145th Place, Miami, FL 33186.

GARDNER, KARL R.: Route 1, Box 1452, Fleetwood, PA 19522.

HARLEY, ROBERT STEPHEN: 1310 Pinecrest Road, Spartanburg, SC 29302-3332.

HAYES, JANE L.: ARS/USDA, P.O. Box 346, Stoneville, MS 38776.

HICKMAN, JANET G.: 107 Lee Circle, Lynchburg, VA 24503.

HOLY, E. MICHAEL: 104 Woodside Lane, Liverpool, NY 13090-2226.

HOOPER, RONALD R.: Box 757, Fort Qu'Appelle, Saskatchewan S0G 1S0, CANADA.

HUTCHISON, DIRK A.: 10054 Casa de Oro Boulevard, Spring Valley, CA 92077.

JACQUES, JAMES R.: 615 West Armitage Street, Chicago, IL 60614.

KINDER, STEPHEN R.: 1004 East 108th, Kansas City, MO 64131.

KOIKE, HISAYOSHI: 4-968-12 Shimizu, Higashi-Yamato, Tokyo 189, JAPAN.

LACEY, WILLIAM: 704 South 35th Street, Omaha, NE 68105.

LAURENT, KURT B.: 5550 East Canfield Road, Chana, IL 61015.

McCLELLAND, LARRY A.: 1012 Timber Lane, Glenwood, IA 51534.

McGOWAN-TUSKES, ANN: 7900 Cambridge, #111-D, Houston, TX 77054.

MILLER, HOWARD C. (Dr.): Emeritus Prof. & Ext. Specialist, College of Environmental Science & Forestry, State University of New York, Syracuse, NY 13210.

MILLER, JACQUELINE Y.: Allyn Museum of Entomology, 3621 Bay Shore Road, Sarasota, FL 33580.

MILLER, LEE D.: Allyn Museum of Entomology, 3621 Bay Shore Road, Sarasota, FL 33580.

MILLER, STEPHEN: 17876 Oak Way, Grass Valley, CA 95945.

MONTGOMERY, LYNN: 2228 Bald Eagle Road, Drumore, PA 17518-9718.

NAGANO, CHRISTOPHER D.: Entomology Section, Natural History Museum of Los Angeles County, 900 Exposition Blvd, Los Angeles, CA 90007.

NEUNZIG, H. H.: Dept. of Entomology, North Carolina State University, P.O. Box 7613, Raleigh, NC 27695-7613.

OPLER, PAUL A. (Dr.): U.S. Fish & Wildlife Service, Office of Information Transfer, Creekside Two Building, Suite 270, 2629 Redwing Road, Fort Collins, CO 80526-2899.

ORTEGON, ANTHONY (M.D.): 314 West 16th Street, Pueblo, CO 81003.

PENNER, HENRY D.: Route 1, Box 16, Upper Kennetcook, Hants County, Nova Scotia B0N 1L0, CANADA.

PLAGENS, MICHAEL J.: 4407 East Lee Street, Tucson, Arizona 85712.

QUINTRO, HECTOR E.: Department of Biology, Inter American University, Box 3250, Mayaguez, Puerto Rico 00709.

RICHERSON, JACK D.: 611 Highland Street, Hammond, IN 46320-2483.

RITLAND, DAVID B.: 906 NE 20th Avenue, Gainesville, FL 32609-3851.

ROBINETTE, RANDY: 4800 State Rt 5, Ashland, Ky 41101.

SERRANO, MIGUEL E.: 6823 Rosemary Drive, Tampa, FL 33625.

SIMPSON, ROBERT C.: Route 1, Box 154-B, Stephens City, VA 22655.

SITES, ROBERT W. (Dr.): Department of Entomology, Texas Tech University, Lubbock, TX 79409.

SMITH, LESLIE V.: 7589 Twin Oaks, Citrus Heights, CA 95610.

TAYLOR, MILTON D.: 2106 Karen Lane, Anderson, SC 29624.

THURMAN, AL: 510 Roundtree Drive, Fayetteville, NC 28303.

TOSCANO, FRANCIS E.: 741 Mandalay Avenue, Clearwater, FL 33515-1482.

TUSKES, PAUL M.: 7900 Cambridge, #111-D, Houston, TX 77054.

VAN HOOSE, DENNIS: 6052 Glenwood Drive, Huntington Beach, CA 92647.

WATANABE, TAKASHI: 50 Irving Avenue, Englewood Cliffs, NJ 07632.

YOUNG, RONALD M.: Systematic Research Collections, UN State Museum, W436 Nebraska Hall, Lincoln, NE 68588-0514.

ZAMBRANO, STEVEN: 1112 Sparrow Drive, Point Mugu, CA 93042.

The Market Place

Buy • Sell • Exchange • Wants



Items submitted for inclusion in this section are dealt with in the manner set forth on page 10 of the Jan/Feb 1986 NEWS. Please note that in keeping with the guidelines of the Society, henceforth no mention of any species on any threatened or endangered species list will be accepted in these items. This will include all Ornithopterans now and for the foreseeable future. Items will be accepted from members only and will be printed only once unless entry in the maximum of two successive issues is requested. Please keep items short. A maximum of 100 words is allowed. SASE calls for a self addressed stamped envelope.

The Society, as always, expects all notices to be offered in good faith and takes no responsibility for the integrity of any advertiser. Any disputes arising from such notices must be resolved by the parties involved outside of the structure of the Society.

FOR TRADE: Rooted cuttings of Aristolochia tagala, the foodplant of many Birdwings. Will grow in pots outdoors in summer and indoors in winter. Want livestock of Butterflies and/or Foreign Silkmths. Paul Pfenninger, 4085 Floral Dr, Boynton Beach, FL 33436. Phone (305) 732-4123.

WANTED: Used compound laboratory microscope with standard three objectives and a substage condensor. Contact John Lienesch, 2014 Ninth St, Anacortes, WA 98221. Phone (206) 293-2865.

WANTED: To exchange or buy papered American Catocala species. All inquiries welcome. Kenneth Neil, Agriculture Canada Research Station, Kentville, Nova Scotia B4N 1J5, CANADA.

WISH TO EXCHANGE: Many Rhopalocera from the French Alps (List if requested) for Lepidoptera from South America, mainly Colias. Clément Payan, 10 rue Pré-Lagrange, 05500 Saint Bonnet, FRANCE.

WANTED: Contact with world-wide collectors of Lycaenidae. Exchanges preferred. Also exchanges of Diurna from Europe and Asia. Purchase possible. Udo Luy, Weipelsdorfer Str 21, 8609 Bischoberg, West Germany.

EXCHANGE ONLY: Wanted are Erebia, Oeneis, Parnassius from North America and Japan plus Erebia patagonica. Offered are numerous species from France and Europe. Pierre Willien, 37 rue de la République B.P. 37, F. 69171 Tarara cedex, FRANCE.

FOR SALE: Parnassius acedestis laurentii (very rare) from Himalayas; P. nomion nominulus from Mongolia, P. nomion dis from Siberia, P. tianschanicus allmattensis from Kirghizstan. All papered and A1. Exchange offers welcome. H. P. Kimmich, 3372 Mahon Ave, North Vancouver, British Columbia V7N 3T6, CANADA.

WANTED: Correspondence with anyone having conducted business of any nature with International Specimen Supply or a W.B. Richfield of Goleta, California. Please contact Leroy Koehn, 16225 Huntley Rd, Huntsburg, Ohio 44046 U.S.A., preferably before the Ottawa Annual Meeting.

FOR SALE: Numbered limited edition, unframed prints of butterflies and moths by William H. Howe. Available individually or as a set of 4 prints at the Annual meeting in Ottawa, Canada. Unframed size 14" x 17.5". Contact June or Floyd Preston at the meeting if interested.

WANTED: Copies of the following books - D'Abbrera's Birdwing Butterflies of the World and Matthews' Pursuit of Moths and Butterflies. Contact M.D. Channing, 2431 Fairmount, La Crescenta, CA 91204.

FOR SALE: Unfinished Notes on the Bibliography of the Butterflies, by Bridges (1985). A three-part bibliography of 15478 items with an index to the Serial literature covering more than 1000 journals. :512 pp, \$37.50. Also: Notes on the Species-Group Names of the Hesperidae, by Bridges (1983). A five-part catalogue of 9039 names. 280 pp, \$37.50. Price includes postage in N. America only. Add \$2.50 elsewhere. Both available from the publisher, Charles A. Bridges, 502 W. Main, #120, Urbana, Illinois, 61801.

FOR SALE: Raised in Maine - cocoons of H. cecropia. Most females mated with wild cecropia males. Some with wild H. columbia males. H. columbia native to Maine, Michigan and Wisconsin. Ova for sale of A. luna, A. polyphemus, H. cecropia and C. promethea in late May or early June. Interested in trading for or purchasing H. columbia cocoons. Gardiner E. Gregory, Star Route, Box 259, Orland, Maine 04472.

FOR SALE: a few pairs of Teinopalpus imperialis A1 condition, (2) Bhutanitis lidderdalei males A1, (5 pairs) Parnassius charltonius, (10 pairs) P. epaphus. Also from Utah, Parnassius phoebus (pairs), P. clodius, Papilio bairdi f. bairdi & brucei (pairs), and P. zelicaon (pairs). If interested, please send offer. Wayne H. Whaley, Wymount Terrace 6B-349 Provo, UTAH 84604.

FOR SALE OR EXCHANGE: Riker Mounts, Used but most are in excellent condition. Sizes 8X12, 12X16, 14X21. Best Offer or will trade for Parnassius, Colias and Lycaena and Oeneis subspecies. Also WANTED: Parnassius phoebus golovinus, Parnassius phoebus alaskaensis, Parnassius phoebus apricatus, Parnassius clodius strohbeeni. Send asking price to: Marc L. Grinnell, 1137 Riebli Rd., Santa Rosa, California 95404, U.S.A.

EMPLOYMENT WANTED: Will do time-lapse photography of all stages of living Lepidoptera. 4½ years experience! Contact RANDY ROBINETTE, 4800 State Rt. 5, Ashland, KY 41101. Phone (606) 928-3401.

FOR SALE - Books - Journals - Newsletters SASE for pricelist. LBS, P.O. Box 10083. Merrillville, IN 46411.

FOR SALE OR TRADE: Ova of A. io neomexicana, A. pamina, A. zephria, A. polyphemus oculea [New Mexico variety] and H. gloveria [New Mexico variety]. Also available H. hera magnifica papered. Ova available late May and June. SASE for prices. Will only trade for exotic Saturniidae. Jim Coleman, 5812 Leta Rd. N.E., Albuquerque, New Mexico, 87107 U.S.A.

MEMBERS' COMMERCIAL NOTICES.....

COLECTORES ASOCIADOS DE COLOMBIA, P.O. Box 045, Buga, Valle, Colombia S.A. and the Colombian Butterflies, Beetles, Birds, Forests, Plants, etc. want to invite you to the first DARWIN TOUR to Colombia, South America from Miami, Florida U.S.A. (American Plan). The trip will include all meals, excellent hotels, The Darwin Bus, nets, Air fees from Miami to Cali and the services of guides Diego Torres Nñez and Jim Jaques. Seven to nine days of collecting in one of the best collecting area for Morphos, Papilios and Nymphadids. Chances to buy giant Dynastes specimens from local collectors and to enjoy Colombian nature life. Collecting of only insects and plants permitted. Twenty (20) people maximum in a group. Planned for August and September of 1986. For more detailed information write to Colectores Asociados de Colombia or phone #(31) 76433 at one o'clock P.M. Colombian time.

RONALD N. BAXTER (ENTOMOLOGISTS) 45 Chudleigh Crescent, Ilford, Essex, IG3 9AT, England. Suppliers of living stages of Phasmidae and Lepidoptera; dead stock of coleoptera, lepidoptera and miscellaneous insects; books. Yearly subscription to my lists is \$2.00 (cash) sent by Air Mail. New contacts always sought.

JOEL MILLER, P.O. Box 504, West Side station, Worcester, Mass 01602, U.S.A. FOR SALE: Butterflies from Indonesian Islands. Specializing in Bali butterflies. Also butterflies from Sumatra, Sulawesi, Buru, Ceram, Bachan, Irian Jaya, Waigeo and other islands. Papilios and Delias my specialty. All quality specimens are papered with data. Send SASE for 1986 price list.

DICK BURGESS, LONDON PUPAE SUPPLIES, Castleleigh, London Rd, Enfield, Middlesex EN2 6JF ENGLAND. Wish to contact rearers of butterfly pupae, especially those from Central and South America, who are able to supply large or small quantities of pupae. Also have high quality pupae from around the world for sale.

INSECT WORLD, P.O. Box 15432, San Diego, CA 92115-0432, U.S.A. Available: Papilio telegonus, ulysses, blumei, pericles, lorquinianus; Castnia pallasia, decusata, fonsecolombe, linus; Pierella neris ep; Caligo beltrao, brasiliensis ep, martia ep, memnon ep, eurilochus ep; Morpho violacues ep, catenarius ep, aega, menelaus; Prepona laertes ep; Encyclopedia of The Butterfly World by Smart for \$13.00 plus packing and postage; wide selection of tropical butterflies, moths and beetles. Send SASE (39¢ stamp) for a current list. Also WANTED: Papered Lepidoptera, Saturniidae and Coleoptera of the USA. Send your list of available insects please.

AMERICAN BIOLOGICAL SUPPLY CO, 1330 Dillon Heights Ave, Baltimore, MD 21228. FOR SALE: Entomological collecting equipment - nets, spreading boards, pins, glassine envelopes, insect boxes, books, etc. Send \$1.00 for catalog.

INSECTS, div. Combined Scientific, P.O. Box 1446, Ft. Davis, Texas 79734. Phone: (915) 426-3851. Please write for a copy of our new 25th anniversary, 200 page Insect catalog. It contains almost 7,000 items in over 470 families from every major geographical region of the world. For the Lepidopterist there are 48 pages of listings. All items in stock at time of printing.

FORMOSA INSECT FARM, Pei-heng Wu, P.O. Box 2-046, Peitou, Taipei, Taiwan, ROC. Require lepidoptera livestock from all regions; especially from Middle America and South America. All species of Heliconiidae are preferred. Will buy or exchange. Send your offers and approximate delivery dates. Also can supply over a hundred different species of butterfly pupae from all over the world. SASE for price list.

THAI PAPILIO CO, LTD (M.D. Adam Cotton), 54 Doi Saket Gao Road, Tambon Wat Get, Amphoe Muang, Chiang Mai 50000, Thailand. Phone 053-243008. Giant 5-horned rhinoceros beetles (Eupatorus gracilicornis) available in large numbers along with the rarer E. siamensis, plus many other beetles, butterflies and insects of Thailand. All specimens with data; A1 and A1B specimens available. Wholesale pricelist available free on request to dealers only. Visitors also welcome in Chiang Mai. Also, SOLID TEAK CABINETS FOR SALE, top quality, large drawers, suitable for butterflies, insects, minerals, etc. 10 drawer size and 20 drawer size. Can also be made to specifications. Write for price list and further information.

JOHN McFEELY. PURPLE EMPEROR SPECIALIST. 90 STONECHAT AVENUE, ABBEYDALE, GLOUCESTER GL4 9XF ENGLAND. Many unique items in my very latest lepidoptera lists: Butterfly and Moth livestock, foodplants, specimens (both papered and spread/set - ALL BRED) and special offers include numerous species and livestock not previously listed anywhere before. Please send \$1.00 for your own copy by return air mail. WANTED: Contact with anyone able to supply both large and small quantities of any live lepidoptera from all world regions. Also wanted: Livestock and deadstock of any Agrias, Prepona and Morpho species, particularly rare or unusual. Please send full details, all correspondence will be both welcome and answered.

From: The Lepidopterists' Society
Address Correction Requested:
Allen Press
P.O. Box 368
Lawrence, KS 66044

NON-PROFIT
ORG.
BULK RATE
U.S. POSTAGE
PAID
PERMIT NO. 116
LAWRENCE KS.

J. Donald Eff
445 Theresa Drive
Fairview Estates
Boulder, CO 80303

682

=====

DEADLINES: Material for the Jan/Feb issue should reach the NEWS EDITOR by Dec 1 of the previous year, and that for the Mar/Apr issue by Feb 15, for the May/June issue by Apr 1 and for the July/Aug issue by May 1, the Sept/Oct issue by Aug 15 and the Nov/Dec issue by Oct 15. Reports for the SEASON SUMMARY must reach the ZONE COORDINATORS listed on the front cover no later than the 5th of January. NEWS EDITOR is June Preston, 832 Sunset Dr, Lawrence, KS 66044, USA. RIPPLES EDITOR is Jo Brewer, 257 Common St, Dedham, MA 02026, USA.

=====

=====

INFORMATION ABOUT THE SOCIETY.....

Membership in the Lepidopterists' Society is open to all persons interested in any aspect of Lepidopterology. Prospective members should send the TREASURER, Eric Metzler, 1241 Kildale Square North, Columbus, OH 43229, USA, the full dues for the current year, \$25.00 US, together with mailing address and a note about areas of interest in the Lepidoptera; student membership (must be certified) \$15; sustaining membership \$35; life membership \$350. Remittances must be in US dollars, payable to the Lepidopterists' Society. All members will receive the JOURNAL (published quarterly) and the NEWS (published bimonthly). A biennial membership directory will comprise the last issue of the NEWS in even-numbered years.

Changes of address (permanent ones only), Additions or Changes in Telephone Numbers or Areas of Interest and Information about Mailing List Rental: Contact the ASSISTANT SECRETARY, Julian P. Donahue, Natural History Museum of Los Angeles County, 900 Exposition Blvd, Los Angeles, California 90007, USA.

Information on Membership and other aspects of the Society must be obtained from the SECRETARY, Dr. Richard A. Arnold, 50 Cleaveland Rd, #3, Pleasant Hill, California 94523, USA.

Requests for Missed Issues (i.e. those not delivered although dues have been paid on time) should be sent to the TREASURER, Eric Metzler, address above, or the PUBLICATIONS COORDINATOR, Ron Leuschner, address below. Defective issues will also be replaced by the TREASURER. Do not request these of the NEWS editor.

Manuscripts submitted for publication in the JOURNAL are to be sent to Dr. William E. Miller, EDITOR, JOURNAL of the Lepidopterists' Society, Department of Entomology, University of Minnesota, St. Paul, Minnesota 55108, USA. See the inside back cover of a recent issue of the JOURNAL for editorial policies.

=====

AVAILABLE PUBLICATIONS OF THE SOCIETY..... Order from the PUBLICATIONS COORDINATOR, Ron Leuschner, 1900 John St., Manhattan Beach, CA 90266, USA.

CATALOGUE/CHECKLIST OF THE BUTTERFLIES OF AMERICA NORTH OF MEXICO (Memoir No. 2), Lee D. Miller & F. Martin Brown: includes references to original descriptions and location of type specimens. Members and subscribers, \$10 cloth, \$5 paper; non-members, \$17 cloth, \$8.50 paper, postpaid.

COMMEMORATIVE VOLUME, 1947-1972: a 25-year review of the Society's organization, personnel, and activities; biographical sketches; JOURNAL 25-year cumulative index by author, subject, and taxon; clothbound. Members and subscribers, \$6; non-members, \$10, postpaid.

1984 MEMBERSHIP DIRECTORY (current to November 1984). Biennial directory of members and their addresses, with geographic and interest indices. Not available for commercial use. (NEWS #6 for 1984). \$5.00 postpaid.

BACK ISSUES of the JOURNAL and of the NEWS of the Lepidopterists' Society. For a list of the available issues and their cost, postpaid, send a SASE to the SECRETARY or to the PUBLICATIONS COORDINATOR.