



**TORONTO
ENTOMOLOGISTS'
ASSOCIATION**

34 Seaton Drive,
Aurora, Ontario,
Canada, L4G 2K1.

Greetings to all T.E.A. members:

Our new season of meetings will be starting in September as usual and the accomodations have been booked for the following dates:

1989	Saturday	September 23rd	
	Saturday (*)	October 21st	
	Saturday	November 25th	
1990	Saturday (*)	January 27th	<i>Guest</i>
	Saturday (*)	February 24th	<i>Not known on date yet</i>
	Saturday	March 24th	<i>Note symposium</i>
	Saturday	April 21st	<i>Display mtg.</i>
	Saturday	May 26th (tentative)	

All meetings will start at 1 p.m., however, there is a major change for this season. All meetings except those marked with an asterisk will be held in the Multi-Purpose Room which is on the first floor just past the ticket window and straight ahead. Any members wishing to bring slides to a meeting should let the executive know so that a projector and screen may be arranged for the room. The meetings marked with an asterisk will be held in the Lecture Room downstairs (only one date from January and February will be there - not known which as yet).

A sheet for dues payment is enclosed - please return it with your cheque or money order promptly, so that records may be updated and a revised membership list prepared.

If you have any queries, please call Alan Hanks at 235-3742 (day) or 727-6993 (evening).

* * * * *



**TORONTO
ENTOMOLOGISTS'
ASSOCIATION**

Renewal of or Application for:

Membership in the Toronto Entomologists' Association - 1989/90 Season

NAME _____ PHONE _____

ADDRESS _____

CODE _____

FEE (\$15 or \$6 for Students) ENCLOSED _____

Publications Purchased _____

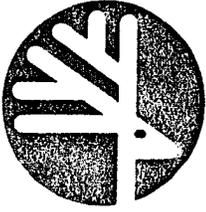
Cheque or Money Order _____ Total _____

Return to: A.J. Hanks, 34 Seaton Drive, Aurora, Ontario, Canada L4G 2K1

* * * * *

If you know anyone else who may be interested in the Association, please have them contact any member of the Executive.

* * * * *



METROPOLITAN TORONTO ZOOLOGICAL SOCIETY

P.O. Box 370, WEST HILL, ONTARIO M1E 4Y9 TELEPHONE (416) 392-5949

Toronto Entomologists' Association,
34 Seaton Drive,
Aurora, Ontario,
L4T 2K1.

Attention : Mr Allan Hanks.

July 11th, 1989.

Dear Mr Hanks,

The Metro Toronto Zoo's Curator of Invertebrates, Tom Mason, has given me your name, so that I can inform you of two presentations that we will be hosting here at the Zoo in September.

I thought that the members of your association might be interested in attending the following events, and would very much appreciate your posting the enclosed announcements on members' notice boards, or including them in your newsletter:

1. "The Incredible World of Bugs"

Prepared by John G. Powers, of Creative Powers Inc., this travelling exhibit will be located in the Zoological Society's Auditorium from September 11th to 16th, 1989, inclusive. Static displays will demonstrate the beautiful, the rare, the deadly, the large and the small, of "The Incredible World of Bugs", and will be free of charge with your admission to the Zoo. The display will be open from 9:30 am to 4:30 pm.

Should a group of your members wish to visit this display, I would be happy to forward you information about group rate discounts for admission to the Zoo.

2. "The Importance of those Spineless Wonders".

Our own Tom Mason will give a talk and slide show on September 17th, at 11 am and 2 pm., for which the fee will be \$5 per person. Again, should a group of your members wish to come to the presentation, please call me, so that I can mail you the group discount information.



TORONTO
ENTOMOLOGISTS'
ASSOCIATION

1989/90

Meeting # 1
89/90 Season

The first meeting of the 1989/90 season was held on Sept. 23rd in the Multi-purpose Room of the Planetarium, starting at 1 p.m. In attendance were John Eberlie, Quimby Hess, Alan Hanks, Tony Holmes, John Prideaux, Gord Edmund, Phil and Pat Schappert, Duncan Robertson and Mario Urbina.

1. Minutes:

The minutes from the January meeting were accepted as read.

2. Matters Arising:

a) John Prideaux noted that he had visited the Metro Zoo to see the 'Flying Jewels' exhibit there. No members took advantage of the opportunity to make up a party to visit the exhibit.

b) The field trip was only attended by two members - Duncan Robertson and John McGregor. Possibly the travel distance and poor weather were factors contributing to this, but surely we ought to be able to do better!

3. New Business:

a) John Eberlie reported on his efforts to obtain speakers for our meetings and noted that Prof. Glen Morris from Erindale will speak on insect acoustic behaviour at the next meeting. Other possible speakers are Steve Marshall (on Diptera) and Gary Allen of the M.N.R. Bill Edmonds will also lead a discussion on *Limenitis* sp. at some time. John also stated that it was time for some changes on the Executive and volunteers are sought. An election will be held in conjunction with the Annual General Meeting (date to be set). John stated that he will not be able to run for office for coming seasons.

Also discussed was the possibility of another 'photographic' meeting, maybe in March of 1990. This was greeted with enthusiasm by all present.

b) The display meeting was briefly discussed, with very favourable comments on the last one. Possibly this can be repeated in 1990.

c) Discussion was held on the infestation of *Lymantria dispar*, referring to areas such as St. Williams, Northumberland County and Peterborough. Other pest spraying programmes were also discussed.

d) Quimby Hess noted that an article had appeared in the Star on *Artogeia virginiensis* and thought that it might have bearing on efforts from some quarters to remove this insect from the Endangered Species List. This is a complex problem and may affect other species that are scarce or local.

4. Financial Report:

The year started with a balance of \$246.58 and after 31 members had renewed, the balance stood at \$608.14.

5. Publications:

a) Al Hanks and John Eberlie brought in copies of "Butterflies of Manitoba by Klassen, Westwood, Preston & McKillop. A well produced book from the Manitoba Museum of Man & Nature in Winnipeg.

- b) Al Hanks brought in copies of a reprint of "Butterflies of California" by Emmel and a new book on "Beetles" by Bernhard Klausnitzer.
- c) A supplement to Miller & Brown was also on hand with *Pieris* apparently now replacing *Artogeia* as a generic name in the Pieridae!
- d) Tony Holmes brought in a superbly bound copy of "Charaxinae Butterflies of Africa" by Henning.
- e) Alan Wormington has produced a five-year supplement to his "Butterflies of Point Pelee National Park" and this will be printed as an Occasional Publication. Anyone interested in having a copy of this should contact Al Hanks, as there will have to be a small charge to cover production costs.
- f) Quimby Hess will accept material for the Annual Summary at any time from now until the end of November. Records should preferably consist of out of the ordinary material in order to conserve a little space. Special reports are particularly useful, together with interesting photos.

6. Specimens:

a) Mario Urbina represents collector/dealers from Peru and brought some specimens of large beetles. He also has lists of specimen prices for various insects. If anyone is interested, please call Al Hanks.

7. Programme:

John Eberlie showed a large number of slides he had taken during the past season - many illustrating phases of various butterfly life histories, with some interesting aspects of behaviour brought out.

Duncan Robertson then gave a slide presentation of large numbers of moths that he had photographed in and around the Kingston area - some of them exhibiting a wonderful diversity of colour and pattern.

The photographic quality of both presentations was outstanding.

* * * * *

NEXT MEETING: October 21st. at the Planetarium in the Lecture Room downstairs. Professor Glen Morris from Erindale. We hope that there will be a good turnout of members for this event.

* * * * *



TORONTO
ENTOMOLOGISTS'
ASSOCIATION

Meeting # 2
89/90 Season

The second meeting of the 1989/90 season was held on Oct. 21st in the Planetarium Lecture Room, starting at about 1:15 p.m.

There are no minutes for this meeting, as I am embarrassed to inform the membership that only four people were present. It was mortifying for me personally, and to the others present, that a speaker had been arranged for and the lecture room booked in order that he could show slides.

Fortunately, he put a good face on things and said that he had on occasion given lectures to smaller groups. I cannot imagine those occasions, but nonetheless, his talk was extremely interesting, dealing with the reactions of insects to the production of sound.

Very recently, I found that one of our members was not renewing his subscription to the Association and spoke with him at some length. He said that he felt the TEA lacked a proper focus and that some of the members did not seem committed to their membership in the TEA. I think that the lack of attendance at the meeting would certainly indicate that something is wrong.

We have a current membership of sixty-eight, of which a large percentage live in or near the Toronto area. Some of these members have never been to a meeting! Duncan Robertson comes from Kingston and John Eberlie comes from Cobourg to attend meetings - surely some of the Toronto members could come out a little more frequently.

Maybe there is something wrong with our programming, but we rarely hear from any members what they would like to see or do at meetings. The Association is well thought of in other areas and our publications are much in demand but we really need more involvement from the membership. This is never more evident than when the question of new officers for the Executive is raised. The same people have been carrying out the duties of the Association for many years and doing their best to keep the TEA a going concern. If the lack of attendance at the meetings continues, maybe it is time to fold up the TEA and let those who are interested join the Entomological Society of Ontario. Please give it some thought!!

The next meeting is on November 25th and Dr. David Gibo has consented to give us some more information on his work on Monarch migration. I sincerely hope there will be a few more people there this time.

Alayth



TORONTO ENTOMOLOGISTS' ASSOCIATION

Meeting # 3
89/90 Season

The third meeting of the 1989/90 season was held on Nov. 25th in the Multi-purpose Room of the Planetarium, starting at 1 p.m. In attendance were John Eberlie, Quimby Hess, Alan Hanks, Tony Holmes, Carolyn King, Gord Edmund, Phil and Pat Schappert, Duncan Robertson, Bill Edmonds, David Gaskin, Chris Rickard, Bud and Val Ridley, Merne Powers, guests Paul McGaw, Geoffrey Hirst, Ray Reiter and Irene Bowman of the Ministry of Natural Resources. It was very nice to see so many people at the meeting.

1. Minutes:

The minutes from the September meeting were accepted with one minor change. Al Hanks' letter re. the October meeting was mentioned.

2. Matters Arising (meetings):

a) The January 27th meeting will have Prof. Darryl Gwynne who will talk on 'Insect Mating'. This meeting will be in the lecture room downstairs.

b) At the February 24th meeting, Dr. Gord Edmund will lead member's talks on their past years insect photography activities together with the showing of slides.

c) The March 24th meeting will have the following agenda:

1) Annual General Meeting. Some new officers are needed for the TEA. John Eberlie has done yeoman work for a number of years as President, but now wishes to step down. Also, we desperately need a Secretary. Positions open are President, Vice-President and Secretary. Let's have some new volunteers! The work is really not that demanding.

2) Some discussion of the aims of the TEA will hopefully take place and should include such items as a draft policy paper and the better management of field trips (see attached suggestion).

d) The April 21st meeting will be the 'Member's Display Meeting'. This will take place in the Planetarium Multi-Purpose Room (MPR) in all probability. The last display meeting was held at the Metro Zoo, where the room for the show was excellent and the co-operation of the Zoo staff was great. Possibly the use of the MPR will be more effective in getting members together and maybe some trading of material can be done. More on this later!

3. New Business:

a) The report to the OMNR on the West Virginia White by Landplan Collaborative Ltd. of Guelph was discussed. A copy of the report ("The Status of the West Virginia White Butterfly in Ontario", October 1989, by Sarah K. Mainguy and Mirek J. Sharp) was tabled.

c) Discussion was held on the current status of the Karner Blue and Frosted Elfin butterflies was held. This included the status of the TEA recommendation to the OMNR regarding the placement of these species on the Endangered Species List under the R.S.O. Act and regulations. Ms. Irene Bowman, Supervisor, Non-Game Section with the OMNR was present and provided information and comments of interest regarding this important subject.

It was decided that the President should forward a letter to the OMNR on behalf of the TEA outlining our thinking on the West Virginia White, Karner Blue and Frosted Elfin butterflies. Tony Holmes suggested a copy of this letter should be sent to the Toronto Star c/o Barry Kent McKay.

4. Financial Report:

The current balance with 49 members paid out of 64 listed, is \$873.57.

5. Correspondence:

Irene Trigg of Thunder Bay sent material regarding the 1990 FON Annual Conference, which is being held in Thunder Bay.

Bert Wigg sent a letter saying why he had not been out to meetings. It also included a poem (see below).

Jeff Larson sent in a letter in which he questioned the practices of a number of collectors who take rare or potentially endangered insects (or other specimens) for their collections. There was some discussion on the possibility of producing an Association 'Code of Ethics' for distribution. John Eberlie volunteered to produce a draft.

6. Publications:

a) John Eberlie brought in 'Origins of N. American Insect Fauna' and a paper from the Amateur Entomologists Society in England titled 'A Directory for Entomologists'.

b) Alan Wormington's Supplement to his "Butterflies of Point Pelee National Park" will be available very shortly at the nominal cost of \$2.50 plus the postage (\$0.75). Interested members should contact Al Hanks (727-6993).

7. Programme:

Professor David Gibo gave another talk on his work on the migration of the Monarch butterfly and some of the techniques used. This contained material additional to his previous lecture and was enjoyed by all those present.

Note: Quimby received a letter from R.G. Tozer, Park Naturalist - Algonquin Park District, Box 219, Whitney, Ontario K0J 2M0 regarding opportunities for jobs. There are two openings available:

a) Park Naturalist @ \$13 per hour

b) Museum Technician @ \$5 per hour (for the first year).

Application forms are available from the above address and the final date for application is Feb. 28th, 1990.

* * * * *

NEXT MEETING: January 27th. at the Planetarium in the Lecture Room downstairs.

* * * * *

"BUTTERFLY" by Bert Wigg

I came out of my pupa and fanned my wings,
And suddenly became a beautiful thing,
I have six legs and cannot walk, neither squeak nor talk,
I hope that soon I learn to fly,
And then I will flutterby!

PROPOSAL FOR AN ENTOMOLOGICAL SURVEY OF THE
LA CLOCHE ARE OF MANITOULIN DISTRICT

Paul Catling, lepidopterist, naturalist and professional botanist was a previous President of the T.E.A. and is now working for Biosystematics Canada in Ottawa. In June of 1976 he was studying the plants of a limestone barren in the La Cloche Peninsula, south of Whitefish Falls in Manitoulin District when he discovered the Garita Skipper [*Oarisma garita* (Reakirt)], a prairie species not previously known in Ontario. This discovery was published as "The Occurrence of *Oarisma garita* (Reakirt) in Manitoulin District, Ontario", by Paul M. Catling, (The Great Lakes Entomologist 1977. Vol. 10, No. 2, p. 59).

In June 1978, I visited roughly the same area and also found the skipper. Since then, as far as I know, nobody has collected or seen the skipper.

Paul Catling has recently told me that the main area where he collected the butterfly belongs to an old man, who cannot live much longer, and he fears that the estate will then be sold and broken up for development, thus destroying the habitat of the butterfly. In 1976 he noted that "some of the habitat was already destroyed". He suggested that this would be a good area for the T.E.A. to do field surveys of the insects so that, together with his botanical survey already done, a good case could be made for preservation of the area as a provincial nature reserve or the like. I believe that there are no official nature reserves, nor indeed conservation areas in Manitoulin District.

All the areas where the Garita Skipper have been found are along Highway 68 between Whitefish Falls and Little Current. Paul Catling gives details of the areas in his article and the place where I found the skipper was in an Indian Reserve near McGregor Bay. The butterfly flies together with *T. lineola*, *P. mystic* and *origenes*, *P. tharos* and *batesii*, *E. cymela* and *C. inornata*. The *inornata* is of the northern form and I believe it is the southernmost area where the greatest proportion of specimens are completely "*inornata*", i.e., have no ocelli. Paul feels that it would be important to have a survey of as many insects as possible, e.g., ants, grasshoppers, beetles, etc., as there are probably other interesting prairie species present in this area. Identification could be easily arranged at Biosystematics Canada or the R.O.M. There would also be a great opportunity for photography as I am sure there are no photographs of the Ontario Garita Skipper and certainly they would be advisable to complement a survey. Also, the plants are unusual in the area.

When I visited the area in 1978, I stayed at a small motel in Espanola, not far north from Whitefish Falls, and I expect there is good accomodation and camping sites in the neighbourhood of Little Current. I suggest that we should try and involve our "Manitoulin members", Dr. Ron Tasker and Professor Morton, both of whom I believe have summer cottages on Manitoulin Island. Perhaps also the local Field Naturalists' Society could be asked to cooperate, i.e., Sudbury Naturalists' Club and Manitoulin Nature Club.

I suggest that a T.E.A. weekend field trip at the end of June would be necessary and also visits by members at other times in order to try and cover the whole summer.

* * * * *



TORONTO ENTOMOLOGISTS' ASSOCIATION

Meeting # 4
89/90 Season

The fourth meeting of the 1989/90 season was held on Jan. 27th in the Lecture Room of the Planetarium, starting at 1 p.m. An excellent turnout of 25 members and guests included John Eberlie, Quimby Hess, Alan Hanks, Tony Holmes, Gord Edmund, Doug Scovell, Phil and Pat Schappert, Duncan Robertson, Carolyn King, Merne Powers, George Bryant, Michael Gurr, Nick Tzovolos, Kit James, Bud and Val Ridley, Eric and Dana Bryant, Chris Rickard, Nancy Ironside, Margo Holt and Paul McGaw.

1. Minutes:

The minutes from the November meeting were accepted as distributed.

2. Matters Arising:

a) Annual General Meeting - March 24th. John Eberlie advised that there will be vacancies for the positions of President and Secretary. Quimby Hess said he was willing to remain as Vice-President. John asked for volunteers to fill some of these executive vacancies.

b) Draft Policy Paper on Collecting. John Eberlie advised he has prepared a first draft which will be attached to this newsletter. He is looking for a lively discussion of the topic at the March meeting.

c) John Eberlie has written the M.N.R. regarding the West Virginia White/Karner Blue/Frosted Elfin and received an acknowledgement. He has also discussed the matter with Ian Kirkham, Executive Director of the F.O.N. It is the recommendation of the T.E.A. that the West Virginia White remain on the Endangered Species List with the other two species being added. If space permits, a copy of the letter may be enclosed with this newsletter.

3. New Business:

a) Status of "The Distribution of Ontario Butterflies". Tony Holmes reported that he is presently revising the text and this should take another 3 - 6 months. He has received a commitment from the Ontario Heritage Foundation for \$2500 and an application has been sent to the World Wildlife Fund and the Ontario Sportsman's Association. It is anticipated that approximately \$15000 will be required. He has discussed the matter with a publisher with a view to making the final product of interest to the general public.

b) The 1989 Summary. Quimby Hess informed those present that he has received many more records than expected and has heard from a number of new members. Also, there are a number of interesting special reports. Therefore, the publication of this Summary will be a bigger job than expected!

c) John Eberlie has a new edition of "Annotated List of Workers on Systematics and Faunistics of Canadian Insects.....". He pointed out that this could be a source of potential speakers for next season.

d) Quimby Hess noted that the M.N.R. will be conducting surveys in Hudson and James Bay areas, and stated there may be one or two places available for amateur entomologists. Despite the flies, muskeg and primitive conditions, this could be a chance to visit areas where few have been and possibly make some interesting butterfly observations.

4. Financial Report:

Alan Hanks noted that the current bank balance is \$1034.04, from 72 members, which is an all-time high. Maybe we can soon reach 100 members!

5. Publications:

a) John Eberlie informed us that the University of Alberta has recently published an interesting history of *Papilio machaon* in western Canada. The book is priced at \$10.

b) Volume 1, Number 1 of the Ontario Amateur Entomologists Newsletter was available for browsing.

6. Programme:

Professor Darryl Gwynne gave a fascinating talk on the evolution of sexual systems and mating behaviour in certain insects, primarily from Australia. The talk was illustrated by excellent slides of Australian katydids, wasps and moths. Also included was the very strange behaviour of a certain type of beetle on 'stubby' beer bottles - extensively reported in the popular press in Australia!!

* * * * *

NEXT MEETING: February 24th. in the Planetarium general purpose room upstairs. The programme will consist of more data on photography and some of the equipment required. Please bring any unusual slides that you might have illustrating photographic techniques!

* * * * *

Proposals for a T.E.A. Policy on Butterfly Conservation

The T.E.A. brochure includes the following statement: "preservation of locally threatened habitats and protection of some endangered species is a matter of concern among members." I suggest that in the next printing of this brochure, this sentence should be changed to: "preservation of threatened habitats and of all threatened species is a matter of concern to members".

The T.E.A. is inevitably involved in conservation because the records contributed by amateur collectors are of inestimable value, amongst other things, in documenting background information for the purposes of conservation. These records are mostly obtained by random collecting which is unlikely to be harmful to an insect population except in very rare instances when a rare species occurs in a confined habitat, in which case repeated annual collecting of even very small numbers could be dangerous. However, generally speaking, random collecting produces valuable information without harm.

The consensus of T.E.A. Members, and indeed of experts in the matter of insect conservation, has always been that the most important aspect of such conservation of lepidoptera is protection, and management if necessary, of their habitats. Other considerations, such as use of pesticides, over-collecting etc. are considered of less importance.

It is suggested that the T.E.A. should form a sub-committee with the following terms of reference:

1. To list all threatened, ie. endangered, vulnerable and rare, species of Ontario butterflies.
2. To eventually classify all ^{OTL or} Ontario butterfly species according to their prevalence, ie. into categories to be determined, such as widespread and common, common locally, scattered colonies etc.
3. To publish these lists in the T.E.A. Annual Seasonal Summaries.
4. To collect published current information about the distribution and conservation of Ontario butterflies and report such information to the membership.
5. To encourage conservation activities by members.
6. To eventually include moths and other insects in all the above.



TORONTO ENTOMOLOGISTS' ASSOCIATION

Meeting # 5
89/90 Season

The fifth meeting of the 1989/90 season was held on February 24th in the Lecture Room of the Planetarium, starting at 1 p.m. A good turnout of 16 members and guests included Quimby Hess, Alan Hanks, Tony Holmes, Gord Edmund, Tom Mason, Carolyn King, Merne Powers, George Bryant, Michael Gurr, Nick Tzovolos, Sid Daniels, Bud and Val Ridley, Chris Rickard, Dr. Greg Williams, Paul and Nan McGaw.

1. Minutes:

The minutes from the February meeting were accepted as distributed.

All other business was waived in order to introduce the main topic for this meeting, which was insect photography.

Gord Edmund introduced the subject with a brief dissertation on insect photography and equipment. The preferred camera of course is the 35mm with through-the-lens metering. The Minolta X-700 was cited as a very good example. Macro lenses are preferable, either 100 mm or 50mm. The longer lens may be used with a 2 times converter to make it into 200 mm and the shorter lens may be used with extension tubes for extra close-ups. A bellows set up may be used for eggs or other minute detail photography.

An auto winder unit is extremely handy for taking a fast series of photographs to make sure that decent exposures or poses are recorded.

Flash units should be mounted at the side of the camera and a smaller slave unit may be mounted on the other side of the camera for fill light. The unit that Gord uses is a Vivitar 2500.

Sid Daniels then demonstrated a Minolta ring flash in conjunction with a 105 mm macro lens and the X-700 camera. It was noted that plenty of batteries should be taken in the field, especially if both flash and auto winder are in use.

The programme continued with a multi-projector slide show by Catherine Belyea. The first part of the show had an emphasis on spiders and the second included other insects and scenery. Both were accompanied by appropriate music and the presentation was thoroughly enjoyed by those present.

Other members also showed slides of their photographic efforts.

The next meeting on March 24th will be the TEA Annual General Meeting. John Eberlie has suggested an agenda as follows:

1. Election of Officers
2. T.E.A. Collecting Policy
3. T.E.A. Conservation Statement
4. Subcommittee for field trips ?
5. April display meeting
6. List of possible future speakers
7. Suggestions for future activities

We need a good turnout for this important meeting. The future of the T.E.A. could well hinge on some of the decisions.



TORONTO ENTOMOLOGISTS' ASSOCIATION

Meeting # 6
89/90 Season

The sixth meeting of the 1989/90 season was held on March 24th in the Lecture Room of the Planetarium, starting at 1:30 p.m. In attendance were John Eberlie (Chairman), Quimby Hess, Tony Holmes, Gord Edmund, Phil and Pat Schappert, John Prideaux, Duncan Robertson, Merne Powers, Michael Gurr, Nick Tzovolos, Kirk Zufelt, Bert Wigg and Greg Williams.

A guest speaker, Gabriel Suare from Mexico was present and gave a talk with a 25 minute colour and sound movie dealing with the Monarch butterfly wintering grounds in the central Mexican highlands. Special emphasis was given to the Monarch conservation program in Mexico. A most educational and wonderful program arranged by Dr. Gord Edmund. Mr. Suare is a mammalogist on a 3 month tour at the R.O.M. He wants experienced film makers to contact him regarding further Monarch film production in Mexico. If interested, call him at the R.O.M.

1. Minutes:

The minutes from the January meeting were accepted as mailed to members.

2. Matters Arising:

a) The Draft Statement by Dr. Eberlie on a T.E.A. Collecting Code was discussed and approved. It is to be included at the front of the 1989 Seasonal Summary now in preparation.

b) The T.E.A. recommendations for the inclusion of the Karner Blue & Frosted Elfin in the Endangered Species Act, R.S.O., and the continued inclusion of the West Virginia White were updated. Very little apparent response to date from the Ministry of Natural Resources, but it is understood that the matter is under consideration.

c) Tony Holmes provided a status update on the proposed publication "Distribution, etc. of Ontario Butterflies". He has nearly completed the re-drawing of the occurrence maps and will then deal with the text.

d) Quimby Hess gave a status report on the 1989 Seasonal Summary now in preparation. Alan Hanks is continuing to enter the data on the computer.

e) Trips to Manitoulin and Grand La Cloche Island are proposed for 1990 for butterfly and moth field surveys. Phil Schappert plans a trip there around Victoria Day. Others are needed to continue the surveys in early July and later. Interested members should contact the Executive re joining these field trips. The Hudson Bay Lowlands survey is not yet finalized.

3. New Business:

a) A draft for a T.E.A. Insect Conservation Policy is attached for members consideration. Comments or responses are solicited.

b) Letters from certain members re TEA operations and meeting format were discussed. This included meeting format mailings to members, collecting policy and formation of action committees to increase membership.

c) The Chairman reviewed speakers for the 1990/91 season. Two are committed to date - David Gaskin (Butterflies of the Aegean Region) and James Fulord (Behaviour of Moths).

4. Financial Report:

The current balance with most members paid, is over \$1000.

5. Correspondence:

a) Beatriz Melangis of the Philippines has a list of butterflies for sale and this is appended.

b) Cyril T. Youll (45 Wynford Heights Cres. Suite 1415, Don Mills, Ontario M3C 1L2 - 440-2752) is selling all his specimens, equipment and literature (Price is \$300).

c) Rick Miramon (2639 N. Johnson, New Orleans, LA 70117, U.S.A.) wants to trade *Hemileuca maia* (wild collected) for Ontario material.

d) John Holoyda (5407 N. Oketo Ave., Chicago, IL 60656, U.S.A.) wants to trade for certain Ontario species. He has Sesiidae. (Al Hanks has his list).

e) Lutz Lehmann (Puschkinstrasse 22, DDR Eisenhüttenstadt 7220) has material from the West Palearctic Region and wants to trade for N. American species with the exceptions of Sesiidae and Psychidae.

6. AGM Election of Officers:

The members present elected the following:

President	-	Quimby F. Hess
Vice-President & Recording Secretary	-	Phil Schappert
Treasurer	-	Alan J. Hanks

The slate was moved by Tony Holmes, seconded by Duncan Robertson and carried unanimously!

The meeting concluded with congratulations to Dr. John Eberlie for a job well done during his tenure of six years as President. Congratulations were also extended to Dr. Gord Edmund for all his work on behalf of the T.E.A. Gord is moving to Florida in a few months for a well-earned retirement from the R.O.M. Al Hanks was not at the meeting but his great efforts on behalf of the T.E.A. were discussed. Al is retiring from the Ministry of Transportation this month.

NEXT MEETING: April 21st at 1 p.m. in the Planetarium Multi-Purpose Room. It will consist of a members show, trade and sell event. All members are invited to bring their exhibits, specimens, books, etc. for showing, telling, trading and selling!



TORONTO
ENTOMOLOGISTS'
ASSOCIATION

Meeting # 7
89/90 Season

The seventh meeting of the 1989/90 season was held on April 21st in the Multi-purpose Room of the Planetarium, starting at 1 p.m. Members present were Alan Hanks, Quimby Hess, Gord Edmund, Carolyn King, Merne Powers, Duncan Robertson, Tom Toyomi Ikeda and Bert Wigg.

1. Minutes:

The minutes from the February meeting were accepted with the following emendations;

- a) Phil Schappert is Corresponding Secretary, not Recording Secretary!
- b) The correct 'phone number for Cyril Youll is 449-2752, not 440-2752!

2. Matters Arising:

- a) Funding is apparently not currently available for the insect segment of the Hudson Bay Lowlands Survey.
- b) The field investigations at Grand La Cloche Island (Manitoulin) will be "organized" as follows: Phil Schappert intends to be up there over Victoria Day weekend. The idea is to meet along Hwy. # 6 between Espanola and Little Current. If anyone wants to check with Phil a couple of days before in case the weather does not look good, his number is (705) 748-2511. Quimby Hess is planning on going up around the first weekend in July & similar arrangements pertain. Quimby's number is 482-1637.

3. Financial Report:

Current balance stands at \$944.67.

* * * * *

We have obtained some material which is listed below. This will be sold at the first (or any reasonable) offer and the realisations put into the TEA funds:

- 1 Long Handled (36") net with 12" dia. bag 24" deep (for sweeping?)
- 1 18" x 3½" setting board - fixed sides
- 1 12" x 4¼" setting board - fixed sides
- 1 12" x 4¼" setting board - adjustable one side
- A dissecting kit (2 needles, scalpel blade holder, forceps and prod)
- 1 12" x 6½" setting board - adjustable one side - for large specimens
- Pinning trays (for Cornell drawers) - 7 6" x 3½"; 5 3½" x 3" and 4 3½" x 1½"

(all these have pinning foam in the bottom)

- 3 Schmitt Boxes; 2 @ 11½" x 9½" (no hinges) & 1 @ 13" x 9" (with hinges)
- 1 copy of "Butterflies" by E.B. Ford (New Naturalist Series) 1st Ed. (good)
- 1 copy of the Lepidopterists Society Commemorative volume (very good)
- Lepidopterists Society Journal - a run from 1974 - 1983 (sell complete or by individual year)

Call Al. Hanks at (416) 727-6993 any evening to discuss the above!

* * * * *

PROPOSALS FOR A T.E.A. POLICY ON BUTTERFLY CONSERVATION

The T.E.A. brochure includes the following statement: "preservation of locally threatened habitats and protection of some endangered species is a matter of concern among members." I suggest that in the next printing of the brochure, this sentence should be changed to: "preservation of threatened habitats and of all threatened species is a matter of concern to members".

The T.E.A. is inevitably involved in conservation because the records contributed by amateur collectors are of inestimable value, among other things, in documenting background information for the purposes of conservation. These records are mostly obtained by random collecting which is unlikely to be harmful to an insect population except in very rare instances when a rare species occurs in a confined habitat, in which case repeated annual collecting of even very small numbers could be dangerous. However, generally speaking, random collecting produces valuable information without harm.

The concensus of T.E.A. members, and indeed of experts in the matter of insect conservation, has always been that the most important aspect of such conservation of lepidoptera is protection, and management if necessary, of their habitats. Other considerations, such as the use of pesticides, over-collecting etc. are considered of less importance.

It is suggested that the T.E.A. should form a sub-committee with the following terms of reference:

1. To list all threatened, i.e., endangered, vulnerable and rare species of all Ontario butterflies.
2. To eventually classify all other Ontario butterfly species according to their prevalence, i.e., into categories to be determined, such as widespread and common, locally common, scattered colonies, etc..
3. To publish these lists in the T.E.A. Annual Seasonal Summaries.
4. To collect published current information about the distribution and conservation of Ontario butterflies and report such information to the membership.
5. To encourage conservation activities by members.
6. To eventually include moths and other insects in all the above.

APPENDIX I

The International Union for Conservation of Nature and Natural Resources (IUCN) makes the following Red Data Book (RDB) status categories for wildlife:

Extinct (Ex); Endangered (E); Vulnerable (V); Rare (R); Intermediate (I) and Insufficiently Known (K). "Threatened" includes categories E, V, R, I and K.

Criteria for this classification are as described in the Red Data Books, eg. page 3 of the Swallow-Tail Red Data Book.

APPENDIX II

The Ontario Endangered Species Act includes the following paragraphs:

5. No person shall wilfully,

- (a) kill, injure, interfere with or take or attempt to kill, injure, interfere with or take any species of fauna or flora (covered by the Act);
- (b) destroy or interfere with or attempt to destroy or interfere with the habitat of any species of fauna or flora (covered by the Act).

The penalties for contravening the Act are a fine of up to \$3,000 or imprisonment for up to six months, or both.

Draft "Code for Insect Collecting" for the T.E.A. summarized and paraphrased from the "Code for Insect Collecting" issued by the Joint Committee for the conservation of British Insects" in 1971 and also from the statement of the committee on collecting policy of the Lepidopterists Society in the U.S.A.

Benefits of collecting of lepidoptera and other insects:

1. It is a means of introducing people, particularly children, to an awareness and study of an important part of their natural environment.
2. It has an essential role in the elucidation of scientific information, both for its own sake and as a basis from which to develop rational means for protecting the environment and its resources.
3. It is a recreational activity which can be pursued in a manner not detrimental to the environment.

Purposes of collecting:

1. To create a reference collection for study, appreciation and education.
2. To document regional diversity, frequency and variability of species and as voucher material for published records. This includes the important matter of monitoring the fluctuation of populations.
3. To document faunal ^{re}presentation in environments threatened with alteration by man or natural forces.
4. To ^{ti}participate in the development of regional check lists and institutional reference collections. Collections in museums, universities and the Canadian National Collection have depended to a large extent on the efforts of amateur collectors.
5. To complement a planned research endeavour.

Ethics of collecting:

1. A collection of adults should be limited to sampling the population concerned.
2. Insects should be examined while alive and, if not required, released where they were captured.
3. The same species should not be taken in numbers year after year from the same locality.
4. Specimens for exchange should be taken sparingly.
5. Insects should not be collected for commercial purposes; for such purposes they should be reared or obtained from old collections.
6. Specimens that are listed as threatened, vulnerable or rare, should be collected with the greatest restraint. It is suggested that one pair is sufficient. Likewise, one pair of distinct local forms should also be regarded as sufficient.
7. When collecting where the extent or fragility of the population is unknown, great caution and restraint should be exercised.

8. Previously unknown localities for rare species should be reported, eg. to the editors of the T.E.A. seasonal summary, but the exact locality should not be published, only the township or nearest town or village.
9. Light traps. Live traps are preferable and should be visited regularly and the catch should not be killed wholesale for subsequent examination.
10. Always respect restrictions on collecting in national or provincial parks, nature reserves and conservation areas. Do as little damage to the environment as possible.
11. Rearing from a captured fertilized female, or from pairing in captivity is preferable to taking a series in the field, if for a personal collection.
12. Never collect more larvae than can be supported by the available supply of food-plant.
13. Insects reared in excess of need should be released in the original locality.
14. Malaise traps probably should not be used by amateurs. In any case, they should be limited to planned studies.

Responsibilities for collecting^{at} material

1. All specimens should be preserved with full data attached.
2. All materials should be protected from physical damage and deterioration.
3. Collections should be available for examination by qualified researchers.
4. Collections, with their full data, should be willed or offered to an appropriate scientific institution, eg. a museum or university, in case of lack of space, loss of interest or death.
5. Type specimens, especially holotypes or allotypes, should be deposited in appropriate institutions.

Related activities

1. Collecting should include field notes regarding habitat, weather conditions and other pertinent information.
2. Recording of observations of behaviour and biological interaction should receive as high a priority as collecting; such observations are particularly welcomed for inclusion in the T.E.A. Seasonal Summary.
3. Photographic records are to be encouraged, but it is emphasized that full data for each photograph should be recorded.
4. Education of the public regarding collecting and conservation, as reciprocally beneficial activities, should be undertaken whenever possible.