

newsletter

society for invertebrate pathology

Volume IX, Number 2 April 1977

Xth Annual Meeting Society For Invertebrate Pathology And 28th Annual AIBS Meeting 21-26 August 1977

For its 28th Annual Meeting the AIBS returns to its traditional August dates for a visit to the lovely campus of Michigan State University in East Lansing. The natural beauty of the state and the diverse biological, geological, and historical sites in and around East Lansing are certain to attract numerous biologists and their families. The MSU campus, itself a working botanical collection, and the fine meeting facilities afforded through the Kellogg Center for Continuing Education and the Brody Hall Complex, will provide a most enjoyable setting for the 1977 AIBS Meeting.

The AIBS Meeting headquarters will be located in Brody Hall, which is situated in the center of the Kellogg Center/Brody Hall Complex on the northwest corner of the MSU campus. The registration area, information and message center, placement and press rooms, scientific and commercial exhibits, and poster sessions will also be housed in Brody Hall. Many scientific sessions will be held in both Brody Hall and the Kellogg Center for Continuing Education, a 2-minute walk directly across the street from Brody.

ADVANCE REGISTRATION

To avoid the inconvenience of registration processing upon arrival, participants are advised to register in advance of the Annual Meeting by submitting the attached "Registration Application" to the AIBS Offices in Arlington, Virginia, and by submitting the "Advance University Housing Application" and "Transportation Request" directly to the Manager's Office, Brody Hall at Michigan State University. Do not send the housing application to the AIBS.

The AIBS will accept advance registration applications until Friday, 22 July 1977. After 22 July a late fee of \$5.00 will be levied for both regular and student registrations.

REGISTRATION FEES

- \$25.00 Advance registration received by mail on or before 22 July.
- \$30.00 Late registration received after 22 July by mail or at the Meeting.
- \$10.00 Graduate or undergraduate student registration received by mail on or before 22 July.
- \$15.00 Late graduate or undergraduate student registration received after 22 July or at the Meeting.
- \$ 5.00 Spouse registration (not attending scientific sessions).

All participants, including invited speakers, must pay the registration fee.

Registration fee includes directory cards, name badges, and General Program. The registration fee also helps defray meeting expenses such as printing, postage, meeting space charges, audiovisual operators, audiovisual equipment not available from the university, shuttle transportation service, security, and other associated costs.

GENERAL PROGRAM

The General Program will be mailed prior to the Annual Meeting only to those persons who preregister by mail on or before Friday, 22 July. All other copies of the Program will be distributed at the registration desks in the Northeast Lobby of Brody Hall during the hours of final registration at MSU.

REGISTRATION ACKNOWLEDGMENTS

The AIBS will acknowledge all advance registrations received on or prior to 22 July 1977. These acknowledgment receipts should be presented at the registration desks in the Northeast Lobby of Brody Hall upon arrival on campus.

REFUNDS

The AIBS will refund advance registration fees for all cancellations received in writing or by telegram on or prior to Saturday, 20 August 1977. NO REFUNDS WILL BE GRANTED AFTER THIS DATE. Refunds will be mailed from the AIBS offices following the Annual Meeting.

FINAL REGISTRATION

Final registration and distribution of AIBS badges and General Programs, with the exception of those mailed to preregistrants prior to the Meeting, will take place in the Northeast Lobby of Brody Hall during the following hours:

Saturday, 20 August 1:00 p.m.—6:00 p.m.
Sunday, 21 August 8:00 a.m.—6:00 p.m.
Monday, 22 August 7:30 a.m.—5:00 p.m.
Tuesday-Wednesday, 23-24 August 8:00 a.m.—5:00 p.m.

UNIVERSITY HOUSING AND MEAL INFORMATION

Campus housing for AIBS participants will be available in the Brody Residence Hall Complex and in the Kellogg Center for Continuing Education. Brody Hall, which is surrounded by the 6 residences, and the Kellogg Center for Continuing Education will be used for many of the scientific sessions.

BRODY RESIDENCE HALLS

The Brody Residence Hall Complex includes Armstrong, Bailey, Bryan, Butterfield, Emmons, and Rather halls. Each hall has 4 floors of sleeping rooms. There are no passenger elevators. Although the residence halls are not air-conditioned, the mean temperature for Lansing in mid-August is approximately 70°, the average daytime temperature in the mid-80's, and the average nighttime temperature in the low 50's. Lounges, laundry facilities (washer-50¢, dryer-free), and vending rooms are available in each hall; "community" type bath facilities are conveniently located on each floor. Room service and morning call service cannot be provided.

Bed linen, pillows, towels, washcloths, soap, glasses, and local-service telephones in each room are included in the housing rates. Although daily housekeeping service is not available, beds will be made upon arrival and soiled towels may be exchanged for fresh upon request at the reception desk in each residence hall.

Children 12 years of age or younger may occupy their parents' assigned room free of charge except where a rollaway bed is provided for \$2.00 each. All other children will be assigned to a bed. If it is necessary to assign a child to one-half of an adjacent double room, the parents will be charged the rate equivalent to one-half of a double room rate. Should the parents indicate that they do not wish anyone else assigned to their child's room, the parents will be charged the single room rate. The University cannot furnish cribs or bassinets.

Single Occupancy: \$ 9.25 per person per night + 4% tax Double Occupancy: \$14.00 per room per night (\$7.00 per person) + 4% tax

Special accommodations for STUDENTS who wish to take advantage of a reduced rate by sharing a triple room will be available for \$4.50 per person per night + 4% tax. These accommodations will include a bed or cot, linen, pillow, towels, blanket, and soap. (Make your own beds upon arrival. No telephone service.) There are a limited number of these

triple-room accommodations available. Advance registration is required.

MSU CHICKEN BARBECUE

AIBS participants and their families are cordially invited to a "Chicken Barbecue" on Sunday evening, 21 August from 4:00 p.m. to 7:00 p.m. on the lawn adjacent to Brody Hall. Tickets for the barbecue (\$4.90 for adults and \$2.50 for children under nine years of age) will be sold in the AIBS registration area during the Saturday and Sunday registration hours. If you plan to attend, please complete the information on the bottom of the AIBS "Registration Application." DO NOT SEND PRE-PAYMENT. In the event of inclement weather, the barbecue will be held in the Brody dining rooms.

KELLOGG CENTER FOR CONTINUING EDUCATION

The Kellogg Center for Continuing Education, one of the nation's largest adult education centers, will provide convenient housing for a limited number of participants wishing to stay in a hotel-type facility. The Kellogg Center is air-conditioned, and bed linens, towels, soap, daily housekeeping service, ice, and glasses are included in the room rates. Each room has a telephone with a local per use charge of 25¢. Children 12 years old and younger in a double-occupancy room with their parents are free of charge except where a rollaway bed is required (\$3.00 + 4% tax). Assignments for the Kellogg Center will be made on a first-come, first-assigned basis. If all available space in the Kellogg Center has been filled, a limited number of requests for Kellogg Center lodging will be forwarded automatically to the University Inn for assignment and confirmation. The University Inn is located one mile from the Center. Free transportation between the Kellogg Center and the University Inn will be provided by the University Inn.

Single Occupancy: \$17.00 per person per night + 4% tax
Double Occupancy: \$21.00 per room per night (\$10.50 per
person) +4% tax

ASSIGNMENTS

Advance registration for Brody Residence Hall accommodations or Kellogg Center accommodations must be made by submitting the "Advance University Housing Application" to the Manager's Office, Brody Hall at MSU.

Participants who register for Brody Residence Hall housing in advance of the Meeting may request accommodations in the residence hall where other members of their society of primary interest are housed. Registrants should list only one society on the Advance University Housing Application. These requests for housing by society will be honored on a first-come, first-assigned basis so long as space is available.

Roommate requests will be honored only if the Advance University Housing Applications are mailed together to the Manager's Office, Brody Hall. Housing assignments will be made according to (a) residence hall or Kellogg Center, (b) roommate request, (c) participants accompanied by children, and (d) society request. Insofar as possible, participants accompanied by children will be assigned to the same housing area or residence hall.

CONFIRMATION

Registrants will receive advance confirmation of their residence hall or Kellogg Center assignment, provided the request is received by the Manager's Office, Brody Hall at Michigan State University by 1 August 1977. Individuals who have preregistered for housing and received confirmation of their residence hall or Kellogg Center assignment should proceed directly to their assigned lodging upon arrival on campus. Final room assignments and payment for housing in the Brody residences will be made at the time of check-in. Payment for accommodations and services in the Kellogg Center will be made at the time of check-out. Prepayment for housing will not be accepted. Those who have not preregistered for housing or have not received written confirmation of their lodging should report upon arrival on campus to the Housing Desk in Brody Hall. The Housing Desk will be open during the same hours as AIBS registration. Arrival during these hours will greatly expedite the processing of on-site housing assignments.

OCCUPANCY

The Brody residence halls will be available for occupancy at 12:00 noon on Saturday, 20 August and will close at 2:00 p.m. on Friday, 26 August. Any participant staying in the Brody Residence Hall Complex who wishes to remain on campus after 2:00 p.m. on Friday, 26 August, must make arrangements for housing in the Kellogg Center after the close of the residence halls. These arrangements must be made prior to the Annual Meeting.

Participants arriving prior to 12:00 noon on Saturday, 20 August for premeeting field trips or committee meetings will be housed in one residence hall in the Brody Complex or in the Kellogg Center for the duration of the Meeting. Arrangements for early arrival accommodations must be requested well in advance of the Meeting by writing to the Manager's Office, Brody Hall.

PAYMENT

Prepayment for university housing will not be accepted. All charges will be collected at the time of check-in at the assigned Brody residence hall reception desk and at the time of check-out from the Kellogg Center. Payment may be made by cash, personal check, traveler's checks, Bank Americard, Master Charge, or money order payable to "Michigan State University." If payment is made by traveler's checks, the University requests that the checks be of small denominations (\$10's and \$20's).

REFUNDS

Refunds of housing fees will be granted only for reasons of illness or special emergency.

FOOD SERVICE

Michigan State University will offer meals on a package plan through the cafeterias located in Brody Hall, beginning with breakfast on Monday, 22 August and ending with dinner on Thursday, 25 August. Prior to Monday morning, meals may be obtained on an a la carte basis in the Kellogg Center and in Brody Hall. On Friday, 26 August breakfast will be available in Brody Hall and the Kellogg Center on an a la carte basis only. The package plan meals are designed for the convenience of participants wishing to save money and secure meals in the cafeterias in the residence hall complex. Prices for the meal plans are as follows:

Plan A: Breakfast, Lunch, and Dinner \$28.40 + 4% tax Four full days, Monday-Thursday

Plan B: Breakfast, Lunch, and Dinner \$21.30 + 4% tax Three full days

Individual meal tickets for less than 3 full days' meals may be purchased at the door.

Children 4 through 8 years of age: ½ price Children 3 years of age or younger: No charge

The hours for a la carte and package-plan meal service in Brody Hall will be:

 Breakfast
 7:00 a.m.-8:15 a.m.

 Lunch
 11:30 a.m.-1:30 p.m.

 Dinner
 5:00 p.m.-7:00 p.m.

Refunds will be given for package-plan meals missed because of attendance at society-sponsored breakfasts, luncheons, or dinners provided the refund is requested at least 12 hours prior to the event.

Individual meals on an *a la carte* basis will also be available in the Kellogg Center and the Union Building. The hours for meal service in the Kellogg Center are:

Monday-Saturday		Sunday			
Breakfast	7:6€ a.m10:00 a.m.	8:00 a.m10:00 a.m.			
Lunch	11:30 a.m 2:00 p.m.	12:15 p.m 4:00 p.m.			
Dinner	5:30 p.m 8:00 p.m.	12:15 p.m 4:00 p.m.			
Snacks		4:00 p.m6:00 p.m.			

The hours for a la carte meal service in the Union Building Cafeteria are:

Monday-I	Friday (closed Saturday)	Sunday
Lunch	11:15 a.m1:15 p.m.	12:00 noon-2:00 p.m.
Dinner	5:00 p.m7:00 p.m.	-

OFF-CAMPUS HOUSING

MOTEL ACCOMMODATIONS

Requests for off-campus accommodations must be made directly with the motel of your choice. For those participants who wish to stay in an area motel, the AIBS has reserved rooms at the four motels listed below. Reservations for the AIBS block of rooms must be made NOT LATER THAN 22 JULY. When making a reservation, please indicate that you are attending the AIBS Meeting at Michigan State University.

Single

Double

Distance

to Campus

	Sinfic	Double	to Campus
University Inn 1100 Trowbridge Road East Lansing, MI 48823	\$18.00	\$22.00	1.1 miles
(517/351-5500)			
Free transportation to Kand cocktail lounge; pool	ellogg Cer	nter; adjacen	t restaurant
Albert Pick Motor Hotel 1427 W. Saginaw Street	\$18.45	\$22.95 (1 bed)	1.3 miles
East Lansing, MI 48823		\$24.30	
(517/337-1741)		(2 beds)	
No charge for children cocktail lounge	under l		ning room,
Holiday Inn-East	\$18.50	\$22.50	1.4 miles
3121 East Grand River Rd.		\$25.00 (1	riple)
Lansing, MI 48912 (517/351-1220)		\$28.00 (4	quad)

Hospitality Motor Inn	*\$25.00	\$29.00	3.4 miles
3600 Dunckel Drive		(1 bed)	
Lansing, MI 48910		\$31.00	
(517/351-7600)		(2 beds)	
(800/321-2323)			

Dining room, cocktail lounge; 24-hour coffee shop; pool; tennis courts; entertainment & dancing; no charge for children under 21 sharing parents' room; courtesy transportation to campus and airport

*This is the maximum single rate. Rooms may be available at a lower rate.

NOTE: Rates do not include 4% tax.

CAMPING

Camping facilities in East Lansing are limited. The closest campground is 5 miles from the MSU campus and would be recommended only for "self-contained" campers; cleared land, water, electricity, and bath facilities are limited. Camping is prohibited on University property. Persons wishing additional information on camping should write to the Convention Bureau of Greater Lansing, Suite One, Civic Center, Lansing, MI 48933 (Tel. 517/487-6800).

CAMPUS PARKING

An AIBS registrant may park without cost and without permit in the designated areas of Brody Hall (except those spaces reserved for MSU staff, faculty, university vehicles, loading zones, and metered spaces), and Parking Lot L located immediately south of the Brody Complex. Parking at the Kellogg Center is limited to metered spaces or spaces within the coin-operated, gate-controlled lot for which the appropriate parking fee must be paid. Parking elsewhere on campus will be in accordance with posted regulations.

TRANSPORTATION

East Lansing is accessible by air, train, or bus. Flight time from Chicago is approximately one hour, from Cleveland one and one-half hours, from Detroit 30 minutes, from New York three hours, and from Los Angeles about five hours. Amtrak, transcontinental bus lines, and major highways also serve the city.

AIRLINE SERVICE

The Capital City Airport is approximately 8 miles west of the MSU campus on Grand River Avenue (Highway 96). Daily flights by United and North Central Airlines to and from Detroit, Chicago, and Cleveland connect the airport to every major metropolitan area in the country. In addition, United Airlines offers a direct flight daily from New York to Lansing's Capital City Airport. Check with the airlines in your city for other direct flights to Lansing. Taxicabs from the airport to the Kellogg Center, approximately 20-30 minutes driving time, are available for \$5.75 for one to five persons. Transportation service to the Kellogg Center and Brody Residence Hall Complex with intermediate stops at the Albert Pick Motor Hotel, Hospitality Inn, Holiday Inn-East, and University Inn will be available beginning 12:00 noon on Saturday, 20 August through Monday, 22 August for a nominal fee of \$1.50 per person. Reservations for this special shuttle service should be made by returning the attached "Transportation Request" to the Manager's Office, Brody Hall with the "University Housing Application." Upon arrival, all participants requesting this service should check in at the AIBS Transportation Desk in the lobby of the Capital City Airport. For return transportation to the airport, beginning Wednesday morning, 24 August, reservations must be made at the AIBS Transportation Desk in Brody Hall during the hours of final registration. Departure for return to the airport should be scheduled at least 90 minutes prior to scheduled flight departure.

RAILWAY SERVICE

Limited passenger service is available by Amtrak via Chicago, and connects East Lansing with some 400 cities across the country. Call this toll-free number for additional information: 800/621-0353.

BUS SERVICE

East Lansing is served by Greyhound Bus Lines, Indian Trails, and North Star Lines. Check with your local bus travel agent for connecting points with the above lines.

AUTO RENTAL AND LEASING

The following companies are located within or near Lansing's Capital City Airport for convenient car rental: Avis, Budget Rent-A-Car, National, Hertz, and Thrifty.

CHILD CARE FACILITIES

Arrangements are being made for special child-care facilities for children whose parents wish to attend daily scientific sessions. Additional information concerning the daytime child-care program will appear in the June issue of BioScience and in the General Program.

RECREATION FACILITIES

Recreation facilities in and around the Men's and Women's Intramural Buildings will be available to all AIBS participants. The fee per use of the facilities is \$1.50 for adults and \$.50 for children 13 years and above. An AIBS Meeting name badge must be presented as identification at the supply rooms of the Men's and Women's Intramural Buildings prior to each use.

If sufficient interest is expressed in recreation facilities for children under 13 years of age, arrangements will be made for special times and fees for this age group. Please indicate your interest in using the recreation facilities and the ages of children by completing the information contained on the Advance University Housing Application under the section "Brody Residence Hall Housing." Please list names and ages of accompanying children.

Facilities and activities available in the *Men's Intramural Building* include basketball, tennis, volleyball, handball, and squash courts; one indoor swimming pool; golf driving nets; steam rooms; locker and shower rooms for men and women; and areas for jogging and table tennis.

The Women's Intramural Building offers two indoor swimming pools (1 with sundeck); basketball and badminton courts; exercise room; and locker and shower rooms for women and men.

Outdoor recreation and intramural facilities include one swimming pool with diving tower located behind the Men's Intramural Building; two lighted platform tennis courts located on the East campus; tennis courts located behind the Stadium; the varsity track located next to the tennis courts (may be used when the team is not practicing); and an archery range located behind Jenison Fieldhouse.

Persons wishing to play golf at the MSU golf courses may do so for the alumni rates of \$5.00 for 18 holes and \$3.00 for 9 holes. Presentation of the AIBS Meeting name badge is required for admission to the championship golf course at the alumni rates. The hours are 7:30 a.m. until dusk each day, seven days a week. Reservations for starting times are available one week in advance. Carts are also available.

SOCIETY-SPONSORED FIELD TRIPS

Ten sightseeing tours have been arranged by AIBS and twelve field trips will be sponsored by various societies prior to, during, and following the 1977 Annual AIBS Meeting. Reservations and prepayment are required. For further details on the available trips and tours, contact Dr. Richard Snider, AIBS Field Trip Coordinator, Department of Zoology, 220 Natural Science Building, Michigan State University, East Lansing, MI 48824 by July 22, 1977.

ADDITIONAL INFORMATION ON THE Xth ANNUAL MEETING SOCIETY FOR INVERTEBRATE PATHOLOGY

Extension of Abstract Deadlines

The Program Committees would like to inform the membership that arrangements for the forthcoming meeting in East Lansing are progressing as planned. However, abstracts are being received at an unusually slow rate, less than five to date. The Program Committee has, therefore, decided it must extend the deadline for receipt of abstracts to April 22, 1977, instead of the former March 31 announced deadline. This new final deadline should permit adequate time for contributors to make their submissions. Forms and instructions for abstracts were provided in the February Newsletter. Reports by graduate students are particularly encouraged. We sincerely hope that supervising/sponsoring professors will make every effort to support student attendance.

We Apologize

Inadvertently omitted from the list of Permanent Program Committee members in the previous Newsletter was Dr. John E. Henry, U.S.D.A., A.R.S, Rangeland Research Laboratory, Montana State University, Bozeman, Montana 59715. As Chairman of the Division on Microsporida, Dr. Henry will be glad to accept abstracts on microsporidia for the contributed paper sessions.

Program Additions

We have received a number of comments for improving the meeting and we thank those who took the time to forward suggestions to us.

In addition to the four symposia already announced in the previous Newsletter, another symposium now has been added to the planned program entitled "Pathogenesis and Mode of Action of Microbial Pathogens: Bacteria and Fungi". As a consequence of new program additions and because we are attempting to coordinate programs with the Society for Industrial Microbiology, it will probably be necessary to make some modest rearrangements to the previously announced morning schedule of symposia. As now planned, the five symposia and convenors are as follows:

- Elizabeth Davidson: Pathogenesis and mode of action of microbial pathogens: Bacteria and fungi.
- 2. Reto Engler: Economics and efficacy of microbial agents in biological control.

- 3. <u>John Breznak</u>: Invertebrate symbiosis (mutualism-commensalism).
- 4. Robert Anderson: Cellular and humoral reactions to disease.
- Thomas Cheng: Invertebrate models for biomedical research.

Contributed papers covering several aspects of invertebrate pathology are still planned for the afternoons.

Microsporida Division Business Meeting and Workshop

A Microsporida business meeting and workshop are planned for Wednesday evening, August 24. Contributions in the form of photographic materials, charts, graphs, posters, histologic slide preparations, electron transmission and scanning photomicrographs, and other display materials related to research with microsporidia are invited. It is anticipated that much discussion and comment will emerge from the workshop resulting in some clarification and resolution of perplexing problems now facing microsporidian researchers. For further information about participation in the workshop and space and equipment needs, please contact Dr. John Henry at the address given above.

Safety of Microbial Control Agents

On Monday evening, August 22nd, the Working Group on Safety of Microbial Control Agents will hold its meeting. Members of the Group will receive details in its newsletter and an agenda will be made available at the meeting.

Field Trips and Social Events on the Program

In addition to the chicken bar-b-que sponsored by the American Institute of Biological Sciences on Sunday evening, August 21, the Society of Invertebrate Pathology will hold its annual banquet and after dinner mixer, Tuesday evening, August 23. On Thursday evening, August 25, the Society will hold a mixer for those planning to stay over into Friday or Saturday.

The Society does not plan to hold any field trips this year, but encourages the membership and their families to participate in other field programs sponsored by other societies. (See section on field trips included in first portion of this Newsletter.)

FOURTH INTERNATIONAL CONGRESS OF PARASITOLOGY

ICOPA IV will be held in Warsaw Poland from 19-26 August 1978. The Second Announcement providing details of the nine sections in the Congress, and pre-registration forms and instructions for contributors may be obtained from:

Professor Bernard Bezubik Parasitology Department University of Warszwa 00-927 Warszwa, POLAND

The nine sections are:

- A Biology, genetics and evolution of parasitic organisms
- B Morphology and taxonomy of parasitic organisms
- CI Parasitic infections of economic and social importance
- CII Parasitic infections of economic and social importance II
- D Therapy and prophylaxis of parasitic infections
- E Immunology in parasitic infections
- F Physiology of parasites and pathophysiology in parasitic infections
- G Epidemiological problems of vector-hosts and intermediate bosts
- H Environmental parasitology and geographical distribution

1978 SOCIETY MEETING AND COLLOQUIUM

Prague, Czechoslovakia is to be the site of the 1978 SIP meetings during the week immediately following the Parasitology Congress. The SIP will share in the celebration of the 20th anniversary of the first insect pathology conference held in Prague in August 1958.

FROM THE INTERNATIONAL UNION OF BIOLOGICAL SCIENCES

The XIX General Assembly of the IUBS held in Bangalore India adopted eleven resolutions the full text of which may be found in IUBS Newsletter No. 10, available from the new Secretary-General Professor E. S. Ayensu, Smithsonian Institution, Washington, D.C. 20560, USA.

Resolution 8 is of particular interest to our Society.

RESOLUTION 8: MICROORGANISMS PARASITIC ON INVERTEBRATES

BEING AWARE that the World Federation for Culture Collections (WFCC) and the IUBS Commission on Invertebrate Pathology (The Society for Invertebrate Pathology - SIP) are concerned with those microorganisms which infect invertebrates and recognizing the importance of such studies,

BE IT RESOLVED that IUBS would support WFCC in the maintenance of culture collections of microorganisms which infect invertebrates and the listing of such microorganisms in the World Directory of the WFCC.

NOTICE

Members who have not already returned their ballot to the Secretary on the proposed dues increase for regular members are encouraged to do so by April 15. A 30% return is required for a valid vote.

WORKSHOPS AND MEETINGS

Second Annual Fish Health Workshop, Tidewater Inn, Easton, Maryland, May 26-27, 1977

The first Eastern Fish Health Workshop was held April 1976 at Hershey, Pennsylvania, in conjunction with a meeting of the Northeast Wildlife Conference. The Fish Health Workshop was attended by individuals interested in the disease of fresh- and saltwater fishes and was patterned after Fish Health Workshops held annually in the midwest and west. Although last year's workshop was largely organizational with brief presentations of current research activities, this year's workshop will be more structured to accommodate presentations by a large group of scientists investigating the health of freshwater and marine fish and shellfish.

The workshop is being hosted by the Pathobiology Division of the National Marine Fisheries Service, Northeast Fisheries Center, Oxford Laboratory, and will be held in Easton, Maryland, May 26-27, 1977. For further information contact:

Dr. Aaron Rosenfield NOAA, NMFS Northeast Fisheries Center Oxford Laboratory Oxford, Maryland 21654 301/266-5193

The Third International Conference on Comparative Virology will be held on May 22, 23, 24, and 25, 1977 at Mont Gabriel, Quebec, Canada.

Conference sessions:

- I Cancer, Viruses, and Environment.
- II Persistent Viral Infections in Man, Animals and Plants.
- III Reservoirs, Vectors, and Transmission of Viruses.
- IV Viral Variations: Molecular and Epidemiological Aspects.
- V Live Virus Vaccines: Present Problems.
- VI Viral Insecticides: Applications and Safety Considerations.
- VII Safety Considerations on Viral Nucleic Acid Engineering.

The Conference is organized by the Université de Montréal and McGill University and is sponsored by the World Health Organization, the Ministry of Health and Welfare of Canada, the Medical Research Council of Canada, the National Research Council of Canada, and the Association des Universités Partiellement ou Entierement de Langue Française.

Prof. Edouard Kurstak (Université de Montréal, Montreal, Quebec, Canada) and Prof. Karl Maramorosch (Rutgers University, New Brunswick, New Jersey, U.S.A.) are chairmen of the Conference.

Chairmen of the Organizing Committee: Dr. Angus F. Graham (McGill University, Montreal) and Dr. Edouard Kurstak (Université de Montréal, Montreal).

The Second International Symposium on Arctic Arboviruses will be held at Mont Gabriel, on May 26 and 27, 1977, after the Third International Conference on Comparative Virology.

The Symposium is organized by the International Committee on Arctic Arboviruses, the Université de Montréal and the University of British Columbia. Emphasis will be on comparison between arctic and tropical arboviruses.

The Symposium is under the auspices of the World Health Organization.

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- IV Viral Variations: Molecular and Epidemiological Aspects.
- V Live Virus Vaccines: Present Problems.
- VI Viral Insecticides: Applications and Safety Considerations.
- VII Safety Considerations on Viral Nucleic Acid Engineering.

The Conference is organized by the Université de Montréal and McGill University and is sponsored by the World Health Organization, the Ministry of Health and Welfare of Canada, the Medical Research Council of Canada, the National Research Council of Canada, and the Association des Universités Partiellement ou Entierement de Langue Française.

Prof. Edouard Kurstak (Université de Montréal, Montreal, Quebec, Canada) and Prof. Karl Maramorosch (Rutgers University, New Brunswick, New Jersey, U.S.A.) are chairmen of the Conference.

Chairmen of the Organizing Committee: Dr. Angus F. Graham (McGill University, Montreal) and Dr. Edouard Kurstak (Université de Montréal, Montreal).

The Second International Symposium on Arctic Arboviruses will be held at Mont Gabriel, on May 26 and 27, 1977, after the Third International Conference on Comparative Virology.

The Symposium is organized by the International Committee on Arctic Arboviruses, the Université de Montréal and the University of British Columbia. Emphasis will be on comparison between arctic and tropical arboviruses.

The Symposium is under the auspices of the World Health Organization.

Further details concerning the program, housing and registration for both meetings can be obtained from:

Prof. E. Kurstak Department of Microbiology and Immunology Faculty of Medicine Université de Montréal Montreal, Quebec, Canada, H3C 3J7.

Accommodations:

Only during the meeting, accommodation at Mont Gabriel Auberge in Laurentian Mountains will cost (full board, including three meals in first class restaurant and luxurious room):

- \$39.00 per day in single room
- \$32.00 per day per person in double room occupancy
- (plus 8% taxes and 15% service charges).

The participants will pay directly at the Hotel Office before leaving. Lodging capacity is limited.

ANNOUN CEMENTS

Proposed Baculovirus Morphotype Code

The family Baculoviridae is now divided into subgroup A (nuclear polyhedrosis viruses) and subgroup B (granulosis viruses) which together form the genus Baculovirus, and subgroup C (nonoccluded rod-shaped nuclear viruses). Several morphotypes occur in nature, and subgroup A could be subdivided into morphologically discrete groups. In addition, several additional DNA containing nonoccluded rod-shaped viruses (with helical symmetry) of the same diameter (30-40 nm) have been described recently as baculoviruses. They are generally shorter than the 3-400 nm nucleocapsids which occur among the occluded baculoviruses, although their length is more variable; they will fall into subgroup C. The genus Baculovirus contains only occluded viruses (virions embedded in a protein matrix concretion), and the recently described new free virus forms complicate the older descriptive systems.

The term multicapsid virion (Hudson et al., Virology 72:244, 1976) has been used recently to describe viruses with more than one nucleocapsid per envelope. This term has been used as the basis for an expanded code encompassing all the presently known forms plus one possible form not yet discovered. The code considers the virion formation (either Multicapsid or Unicapsid) as well as the embedding state of the virions (Multiple embedded, Single embedded, or Nonoccluded=nonembedded free virus forms). The first letter of the two possible (capsid: embedding) code words (underlined above) compose the (binary) morphotype system. The expanded code separates 8 Baculovirus morphotypes, 7 of which are now known from the field.

Critical comments and suggestions are solicited from those who are working in this field which should be sent to

Dr. Ronald H. Goodwin Research Entomologist Insect Pathology Laboratory ARS, USDA Room 214, Building OllA, ARC-West Beltsville, Maryland 20705.

The Morphotype Code is as follows:

Old Names		Present Proposal
	Code	(Virion:embedding)
MEV polyhedrosis bundled virus	ММ	Multicapsid:Multiple (>95%M)
Multiploid virus, NB, etc.	PM	Polytypic:Multiple (>5%<95%M)
SEV polyhedrosis, NS, etc.	UM	<u>U</u> nicapsid: <u>M</u> ultiple (<5%M)
(Malacosoma disstria only?)	(UFM)	(Unicapsid Folded: Multiple)
(none) unknown group	(MS)	Multicapsid:Single
Granulosis, capsule virus	s US	<u>U</u> nicapsid: <u>S</u> ingle
Parasitoid particles (symbiotes?) (Stoltz, 1976, Kingston Colloquium)	MN	Multicapsid:Nonoccluded
Oryctes virus, Gyrinus virus, Rhabdion virus, parasitoid particles (Stoltz)	UN	<u>U</u> nicapsid: <u>N</u> onoccluded

Conventions: An occluded Baculovirus is morphotype MM (multicapsid) when more than 95% of the occluded virions are multicapsid forms (count bundle cross sections only), in an adequate sample of polyhedra; morphotype PM when between 5% and 95% of the occluded virions are multicapsid; morphotype UM when less than 5% of the occluded virions are multicapsid. For the PM group, state the percentage of multicapsid virions after the letter code designation. Example: PM91 (= polytypic, with 91% of occluded virions multicapsid).

Usage: In order to prevent confusion in natural
host coding (use the original host where the natural host is not apparent) we suggest that host names, when used to designate a given virus, include the first letters of the genus and species plus the second letter of the species name. Examples: ACA-PM91

(Autographa californica polytypic multiple embedded baculovirus, 91% multicapsid virions), HZE-UM

(Heliothis zea unicapsid multiple embedded baculovirus), OPS-MM (Orgyia pseudotsugata multicapsid multiple embedded baculovirus), LPO-US (Laspeyresia pomonella unicapsid single embedded baculovirus).

SIP Constitution and Bylaws

A limited number of copies of a recently revised version (1974) of the Society's Constitution and Bylaws are available without charge to interested members. Requests for copies should be made to:

Dr. W. M. Brooks, Secretary Society for Invertebrate Pathology Department of Entomology N.C. State University Raleigh, North Carolina 27607 USA

SIP Trustee Appointment

With the election of Dr. J. Weiser as Vice President for the 1976-1978 period of office and in accord with the Society's Constitution and Bylaws, the Council is pleased to announce that Dr. Michael C. Mix (Department of General Sciences, Oregon State University, Corvallis, Oregon, USA) has been appointed to fill the unexpired portion of Weiser's term as a Trustee for the Society.

Organism Wanted

Dr. A.M. Heimpel wishes to obtain a strain of <u>Serratia marcescens</u> isolated from insects in unhealthy rearings, along with a complete description of the history of the strain. Please send to Dr. A.M. Heimpel, Insect Pathology Laboratory, Room 214, Building OllA, BARC-West, Beltsville, Maryland 20705.

New Viruses

James V. Bell, Microbiologists, USDA-ARS, Bioenvironmental Insect Control Laboratory at Stoneville, Mississippi, collected insect pathogens in the Philippine Islands during January, 1977. The materials which cleared two quarantine inspection stations included bacteria, viruses, fungi, and protozoa. These materials are now in the process of being lab evaluated against several insect pests at Stoneville. Two viruses appear promising against Heliothis larvae.

OBITUARY

On February 19, 1976, Dr. Robert-Philippe Dollfus, a member of the Society of Invertebrate Pathology and a widely acclaimed giant of systematic parasitology, passed away at the age of 89. Those of us who attended the Society's meetings held in Montpellier in 1971 will remember this scholar, who despite his age, was an active participant in both the scientific and social events.

Born in Paris on July 20, 1887, he spent most of his career at the internationally renowned Muséum National d'Histoire Naturelle in Paris. An avid researcher and reader, it was not uncommon for parasitologists all over the world to receive a personal note from Dr. Dollfus periodically informing him or her of some paper that apparently had been overlooked while authoring a publication. His wealth of knowledge pertaining to parasitic organisms, ranging from fungi to arthropods, was phenomenal, although his first love was the helminths. He was the author of over 400 contributions, many in the form of authoritative monographs, each consisting of several hundred pages. His contributions to our knowledge of parasites of invertebrates certainly qualifies him as an immortal among invertebrate pathobiologists. His scholarly works had won him many well deserved honors, the latest being the Rudolf Leuckart Medal of the Deutsche Gesellschaft für Parasitologie awarded in 1974.

The scientific world and the Society for Invertebrate Pathology mourn the passing but will never forget this gentlemanly French scientist. Our heritage has been greatly enriched as a result of his having been one of us.

Thomas C. Cheng Institute for Pathobiology Lehigh University Bethlehem, Pennsylvania, USA

NEW BOOK

Prentice-Hall has recently published a new book on Comparative Immunology which should be of interest to those people working in immune systems. The author of the book is Edwin L. Cooper and is expected to appear in early April. It will have approximately 272 pages and estimated cost is \$18.95.

PUBLICATIONS

Bacillus thuringiensis: Its Effects on Environmental Quality. National Research Council of Canada, Ottawa, Canada KIA OR6, publication no. NRCC 15385, price \$2.00.

Recently, attention has been focused on the development of alternatives to chemical pest control agents. One promising approach involves the use of microbial control agents such as viruses and bacteria. Bacillus thuringiensis, a bacterium used in the control of spruce budworm and other Lepidopterous pests like cabbage loopers has received the most attention.

The Associate Committee on Scientific Criteria for Environmental Quality of the National Research Council commissioned a report on <u>Bacillus thuringiensis</u> to assess its effects on environmental quality. Towards this end the authors have systematically examined the existing scientific data on the toxic components produced during the growth cycle of <u>Bacillus thuringiensis</u> and other biological effects, the field persistence, and the effects on man and his environment.

The document draws attention to some important gaps in knowledge in the available information and makes recommendations towards ensuring a firmer data base to provide scientifically sound answers to a number of key questions. In addition, it provides a model scheme for a systematic, logical evaluation of other microbial pest control agents.

NEW JOURNAL OF INTEREST TO SIP MEMBERS

Pergamon Press has agreed to publish the new International Journal of Developmental and Comparative Immunology. The journal will be issued quarterly, and it is hoped that Vol. 1 will be ready in January 1977. Manuscripts will be photographically reproduced from original typescripts to insure rapid publication. The projected yearly rate is \$55, \$104.50 for two years and a special reduced rate for individuals of \$30. For further details and information, please contact Dr. Edwin L. Cooper, Editor-in-Chief, Department of Anatomy, School of Medicine, The Center for the Health Sciences, Los Angeles, California 90024.

BOOK REVIEWS

Dynamic Aspects of Host-Parasite Relationships. Vol. II. Edited by Avivah Zuckerman. Halsted Press, a division of John Wiley and Sons, New York, 1976, 225 p., \$27.50.

Reviewed by R.J. Elin in American Society for Microbiology News. Vol. 43, #1, p. 65-66, January 1977.

Immunology of Parasitic Infections. Edited by Sydney
Cohen and the late Elvio Sadun. Blackwell Scientific
Publications, Oxford. Distributed by J.B. Lippincott
Company, 1976, 498 p., \$46.

Reviewed by Shirley E. Maddison in American Society for Microbiology News. Vol. 43, #2, p. 125-126, February 1977.

Biology of the Kinetoplastida. Vol. 1. Edited by W.H.R. Lumsden and D.A. Evans. Academic Press, Inc. (London) Ltd., a Subsidiary of Harcourt Brace Jovanovitch, Publishers, 1976, 563 p., \$18.

Reviewed by Pierre-Marc Daggett in American Society for Microbiology News. Vol. 43, #2, p. 129, February 1977.

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Stanley R. Webb Microbiology Department Medical College of VA MCV Station, Box 847 Richmond, VA 23224

Donald J. Witt Depart. of Microbiology Univ. of Utah Medical Center Salt Lake City, Utah

New Publication

Organ Culture in Biomedical Research. Festschrift for
Dame Honor Fell. British Society for Cell Biology
Symposium, no. 1. Edited by Michael Balls.
Cambridge University Press, 1976, \$58.

FROM THE NEWSLETTER EDITOR

Changes of address, membership inquiries, due payment, and <u>Journal of Invertebrate Pathology</u> subscription requests should be forwarded to:

Dr. John D. Paschke, Treasurer Society for Invertebrate Pathology Department of Entomology Purdue University West Lafayette, Indiana 47907, U.S.A.

Dues are payable January 1. If you would like to maintain your membership, please pay all dues in arrears. Dues may also be paid in advance.

Any changes of address or subscription requests for the Newsletter should also be forwarded <u>directly</u> to the treasurer. This will facilitate matters considerably.

I would draw the members attention to the take-out sheet on the Organization of the Society. This was designed as a "pin-up."

A.J. Domnas Editor

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28th Annual AIBS Meeting, 21-26 August 1977
Michigan State University, East Lansing

Please make checks payable to: AIBS Registration
Mail to: AIBS Meetings Department
1401 Wilson Boulevard
Arlington, VA 22209
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(Airline & flight #)