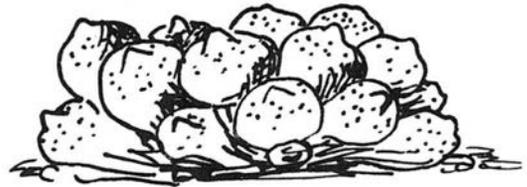


SPORE PRINTS

BULLETIN OF THE PUGET SOUND MYCOLOGICAL SOCIETY
2559 NE 96th, Seattle, Washington, 98115

March 1985

Number 210



ELECTIONS 1985

Ed Bush

Spore Prints reaches you a little early this month. The March issue is your ELECTION NOTICE.

Included you will find your official PSMS BALLOT(S) and a return envelope for your VOTE. A family membership entitles you to two votes, and a single and a student membership to one vote.

Please return your marked ballot in the addressed envelope provided and have it in the mail by Saturday, March 9th.

The election committee has presented you a slate of excellent, capable, and enthusiastic candidates. Their pictures and brief statements appear on page 4.

The election committee urges all members to VOTE for the candidates of their choice, and return the ballots postmarked no later than Saturday, March 9, 1985.

LEARNING FIELD TRIP MARCH 16TH Monte Hendrickson

When you read this bulletin, the weather may not yet convey "spring" and "mushrooms". But we try to schedule the learning (one-day only) field trip at the earliest date possible, so that you may enjoy a long spring mushroom season.

Rain or shine, mushrooms or no mushrooms, this first field trip will be held Saturday, March 16th, 1985.

March 16 Saturday only - no potluck dinner on this outing, but bring your lunch.

MacDonald County Park = Tolt River Park. This park is located a half mile south of Carnation in King County. Enter the park via N.E. 40th Street from Highway #203 to get to the parking lot for the day-use area of the park. Cross the suspension bridge (over the Snoqualmie River) to get to the shelter (which is on the west side of the river). Arrive by 9:00 am. There will be a lecture by Monte Hendrickson on how to recognize cottonwood trees, under which the early morels (Verpa bohemica) grow. After the lecture Monte will lead the hunt. Be sure to bring rain gear, a basket, and wear sturdy footwear. PSMS provides coffee and cookies.

CLASSES - CLASSES - CLASSES

Coleman Leuthy

The preparations for the classes planned for the spring have been completed and we have the following schedule to report to you:

Beginners Orientation Classes will continue through June. These classes are held at 6:45 on the same Monday evening on which the regular monthly membership meetings follow at 8 pm. In March there will be learning field trip on Saturday, March 16th, at 9 am at MacDonald Park in Carnation. In April there will be presentation on the Spring Mushrooms. In May we will cover aspects of mushroom photography, and in June we will learn about the mushrooms we can find during the summer months.

Intermediate Identification Classes will be held from 7 - 9pm on the dates listed below:

- April 15, Monday, Ascomycetes - cup fungi, morels, etc. will be presented by Dick Sieger
- April 22, Monday, The Boletes will be covered by George Rafanelli
- April 29 Monday, the genus Agaricus & Hygrophorus will be presented by Margaret Dilly
- May 6, Monday, Ramarias, Clavarias, and other spring fungi will be discussed by Coleman Leuthy.

It is assumed that you can already recognize the groups of fungi listed above. These intermediate classes will help you identify the species within a genus. We will key the species from any fresh specimens available and from color slides. Please purchase Key Council macroscopic keys for these fungi prior to the class. The keys will be available at the April membership meeting as well as at the classes.

SIGN UP for the classes will be at the April membership meeting. We must know how many people are going to come so we can reserve a room. If only a small number of people sign up, the classes will be held in Room 104 of the Monroe Center and there will be no charge. If many are interested and we have to rent the auditorium, there will be small fee to cover the rental of the auditorium.

IMPORTED CHINESE MUSHROOMS DESTROYED

The Seattle Times, on Jan. 26, 1985 reported that the federal government plans to destroy more than 1,100 cartons of mushrooms from the People's Republic of China because the government claims the food is unfit for human consumption. The mushrooms were not sold to consumers according to the Food and Drug Administration in Seattle. The 68-oz. cans of the mushrooms contained human hair, wood, straw-like fragments, sand and dirt particles, pieces of plastic and metal, and non-mushroom plant material, according to federal court papers filed in Seattle. Each carton bears the label: "House of Excellence Mushrooms Pieces and Stems."

SUMMER AND FALL FORAYS

At this time we know of the following scheduled forays in other parts of the USA or the world:

June 10 - 14 Summer Field Course in the Sierra Nevada. The course is offered at the Field Camp of the San Francisco State University, located near Yuba Pass. Dr. Harry Thiers is the instructor. For further information and registration procedures write to Dept. of Biological Sciences, San Francisco State University, 1600 Holloway Avenue, San Francisco, CA 94132.

June 14 - 16 Foray of the South Idaho Mycological Society. Dr. Orson K. Miller, Jr., will be the foray mycologist. Further information can be obtained from P.O. Box 843, Boise, Idaho, 83701.

Aug. 1 - 4 NAMA Foray at Canaan Valley Resort State Park, W.Va., Write to M.A.W. 2327 - 49th St. N.W., Washington D.C. 20007. You must be a member to attend.



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Spore
Prints

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 PUGET SOUND MYCOLOGICAL SOCIETY
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 Direct all mail to this address

OFFICERS Margaret Dilly, President, 1986 (1)
 John Kunz, Vice President, 1985 (2)
 Ferris Anderson, Treasurer, 1986 (2)
 Betty Hamilton, Secretary, 1985 (1)

TRUSTEES Term expires March 1985: Ernie Boa (1) Judi
 Boa (1); Dennis Bowman
 Edith Godar Charlotte Turner Zila (1).
 Term expires March 1986: Gilbert Austin (1)
 Ed Bush (1); Sally Ann Hansen (1); Betty
 Okura (1); Ron Skoor (1).

ALTERNATES: Alice Austin

IMMEDIATE PAST PRESIDENT: Milton Grout

SCIENTIFIC ADVISER: Dr. Joseph Ammirati

Calendar

March 9 Saturday, last day to mail the election ballots.

March 15 Friday, The 21st Annual Survivors Banquet will be held at Quinn's Restaurant at Shilshole Bay. This is the Annual Meeting of the Society

NO MEMBERSHIP MEETING IS HELD IN MARCH

March 16 Field Trip to MacDonald Park in Carnation

March 18 Monday, Board Meeting, 7:30 pm

March 22 Deadline for Spore Print Material, send to Editor, 2559 NE 96th, Seattle, WA 98115

April 8 Monday, Beginners Class and Membership Meeting

Should the conditions be "right", there will be a field trip the first weekend in April. Watch next month for details.

WELCOME TO THE FOLLOWING NEW MEMBER.S:

Ned & Donna Austin: 885-9243; Richard & Linda Bales: 747-0976; Lew Carpenter: 392-4053; Chuck Erickson: 1-456-3554; David Harkinson: 632-7335; Daniel Josue: 823-5467; Anna Larsen: (907)479-6908; Susan Stine & David Sanders: 783-7469; Mike Wells: (503)235-3533.

FLASH: While this issue of Spore Prints was put together the sun came out, and now the mushrooms cannot be far behind!!!!!!

Membership Meeting

Friday, March 15, 1985, the date for the 21st Annual Meeting and Survivors Banquet is fast approaching. We continue the tradition adopted by our founders and celebrate the survival of a successful mushroom season by holding a banquet.

This year we will have the festive occasion at Quinn's, located at 7001 Seaview Avenue N.W., at Shilshole Bay. The Social Hour begins at 6:30 with dinner following at 7:30. Dinner tickets are selling at \$15 each. They may be obtained from Edith Godar, 11704 - 103rd NE, Kirkland, WA 98033. Be sure you send your check and a stamped, self-addressed envelope. The last day to order a ticket is March 8th. After this date, no refunds can be given.

A No-Host Bar serving wines and non-alcoholic beverages will be set up. For dinner, you can order St. Michelle's Farron Ridge by the glass (\$2.00) or by the carafe (\$7.00) The wine choices were suggested by our Banquet Speaker Tom Stockely.

The menu will include Tossed Salad with Agaricus bisporus; Prime Rib with wild mushroom sauce; Baked Potato; Vegetable; Sour Dough Rolls; and Beverage (regular and decaf. coffee).

Tom Stockely will be our banquet speaker. He is the wine editor of the Seattle Times and the associate editor of Pacific Magazine. He will talk about Food and Wine, how they complement each other.

During the banquet the results of the 1985 elections will be announced and the scholarships awarded. Last but not least, will be the drawing of the beautiful door prizes.

We urge you who are planning to attend the banquet to hurry and purchase your tickets. We promise you a fun evening with good food and good companionship!

MORELS - MORELS - MORELS - MORELS

Minnesota has been the only state which so far has proclaimed an official state mushroom: it's the Morel of course.

Since then, all kinds of merchandise connected with morels is being advertised:

To receive one of the more unusual mail order catalogs you will likely see, send \$2 to Malfred Ferndock, Box 86, Dennison, MN 55018. The unique offerings are all based on a morel mushroom theme and include such novelties as a morel cribbage board, morel cutting board, morel pins and patches, T-shirts, jewelry, notepaper, and more(l). You will also receive an entry form for the first annual "Holy Jumping Cras-sipes, Malfred" largest morel contest. Real morels that you can eat are not offered.

The Curious Morel, Mushroom Hunter's Recipes, Lore & Advice by Larry Lonik has just been published. It contains sections on: How to find Morels; Maps; Photos; Illustrations, Festivals, Organizations; Drying; Freezing; Canning; Laboratory grown morels; Fabulous mushroom recipes; Limited numbered edition autographed. Send a check or money order for \$7.95 plus \$1.00 for postage and handling per book to R K T Publishing, P.O. Box 103, Royal Oak, MI 48068; or order the book from Judi Boa. (P.S. Judi just told me that she has already sent for these items and hopes that they will be here by the April membership meeting, and we can take a look at them.

GOLDEN MOLDIES: FUNGI THAT MADE HISTORY

The Mold That Topped an Industry (*Aspergillus niger*)

Until the early 1920s, Italy produced about 90 percent of the world's citric acid, using low-grade lemons. Exported mainly to the U.S. as calcium citrate, this citric acid was a costly ingredient - about a dollar per pound - used in food, pharmaceutical and industrial processing. When American chemists discovered that *A. niger*, a common black mold found on rotting vegetation, secreted citric acid as it grew in a culture medium, they seized the opportunity to perfect citric - acid production.

Charles Pfizer & Co., of Brooklyn, N.Y., became known as the "world's largest lemon grove" - without a lemon in sight. Hardworking acres of *A. niger* soon were squirting out such quantities of citric acid that by 1923 the price was down to 25 cents per pound, and the Italians were out of business.

The Nobel Mold (*Neurospora crassa*)

The humble bread mold *N. crassa* provided the means for scientists to explore the most exciting biological discovery of our century: DNA. As anyone with an old loaf of bread in the bread box knows, *N. crassa* needs only a simple growing medium, and it has a short life cycle.

With such qualities, this reddish mold enabled George Beadle and Edward Tatum to win the Nobel Prize in Medicine/Physiology in 1958 for discovering the role that genes play in passing on hereditary traits from one generation to the next. By X-raying *N. crassa*, the researchers produced mutations of the genes, or components of DNA, and then found which genes corresponded with which traits.

The Bluish-Green Lifesaver (*Penicillium notatumchrysogenum*)

A few dots of a rather pretty bluish-green mold were Dr. Alexander Fleming's first clue to finding one of the most valuable lifesaving drugs ever developed.

In 1928, he noticed that his petri dish of staphylococcus bacteria had become contaminated with symmetrically growing, circular colonies of *P. notatum*. Around each speck, all the bacteria were dead. Fleming further found that the mold also killed pneumonia, gonorrhea and diphtheria germs - without harming human cells.

Not until 1939 did Howard Florey and Ernst Chain identify penicillin, a secretion of the growing mold, as the bacteriacide. Fleming, Florey and Chain won the Nobel Prize in Physiology/Medicine in 1945 for their pioneering work with the common fruit mold that yielded the first "miracle drug."

The Famine - Maker (*Phytophthora infestans*)

The political history of the world changed as a result of the unsavory activity of *P. infestans*, a microscopically small fungus that reduced Ireland to desperate famine in 1845. Hot, rainy July weather provided perfect conditions for the white fungus to flourish on the green potato plants - most of Ireland's food crop - and the bushes withered to brown, moldy, stinking clumps within days. The entire crop was devastated, causing half a million people to starve to death, while nearly two million emigrated, mostly to the U.S.

P. infestans dusted a powdery white death over Ireland for six years.

The TB Killer (*Streptomyces griseus*)

A lowly mold found in dirt and manure piles, *S. griseus*, had its moment of glory in 1943, when Dr. Selman Waksman discovered that it yields the antibiotic streptomycin, which can cure tuberculosis. Waksman came to the U.S. in 1910 as a Russian refugee, and by 1918 he had earned his doctorate in

soil microbiology. He had worked with *S. griseus* before, but not until a crash program to develop antibiotics was launched did he perceive the humble mold's possibilities for greatness. Streptomycin first was used successfully on a human being in 1945, and in 1952 Dr. Waksman was awarded the Nobel Prize in Physiology/Medicine.

(Excerpted from: "The Book of Lists 3" published by William Morrow & Co., Inc. Copyright, 1983, Amy Wallace, David Wallechinsky, Irving Wallace. Reprinted from the Seattle Times).

COOPERATIVE JAPANESE-AMERICAN MATSUTAKE PROJECT TO BEGIN AT CENTRAL WASHINGTON UNIVERSITY

The most famous and expensive mushrooms are wild species such as Morels, Chanterelles, Truffles, and Matsutakes. Compared to the relatively insipid commercial variety, wild mushrooms offer the discriminating mycophagist nutrition plus a titillating world of flavors, aromas, and textures. But, then why are these species not commercially grown? Simply because most cannot be grown under artificial or even semi-natural conditions. However, in Japan things are changing.

Japanese mycologists have succeeded in enhancing the growth of Matsutake in experimental forest plots. They have accomplished this by carefully studying the ecology and biology of the species and subsequently managing the habitat to provide optimum growing conditions. Dr. Hiroyuki Ohara, who will spend his 1985-86 sabbatical at CWU, has been one of the key scientists in this breakthrough.

A professor of microbiology at Doshisha Women's University in Kyoto, Ohara has studied extensively the microflora associated with Matsutake mycelium. During his sabbatical at CWU he will similarly study our native species, *Armillaria ponderosa* and related species of Matsutake. Both he, and Dr. David Hosford, who is engaged in complementary research, and who has studied Matsutake cultivation in Japan, will plan a long-range research project, including collaboration with scientists from America and Japan.

Their initial research this summer and fall will concentrate on field studies, stressing systematics and ecology. In addition, they will actively gather specimens and somatic (mycelial) isolates to be used in follow-up studies of growth and nutrition. From this initial work they hope to eventually establish pure culture synthesis (mycelium and tree seedlings) in the greenhouse for later outplanting. Ultimately, they dream of being able to grow Matsutakes in vitro.

There is plenty of incentive to make this dream come true. Currently, the asking price for one large Matsutake specimen in Japan ranges from 7,680 - 9,800 yen (approx. \$32-\$40), and the price continues to rise.

(The above information came from the BIOSCOPE the publication of the CWU Dept. of Biological Sciences).

WHO IS SOMEBODY? ANYBODY? NOBODY?

The Spokane Society's newsletter: The Fungus-Amungus says: Everybody knows there are 3 bodies in an organization: SOMEBODY, ANYBODY, and NOBODY. ANYBODY knew there was work for EVERYBODY, but when the president asked for volunteers, saying: ANYBODY can do it, EVERYBODY thought SOMEBODY would, but NOBODY did. Then SOMEBODY decided that since ANYBODY could, but NOBODY did, that SOMEBODY shouldso he/she volunteered. When EVERYBODY saw NOBODY doing what ANYBODY could, but NOBODY did, EVERYBODY lent a hand and it was soon done

CANDIDATES FOR ELECTED OFFICERS FOR P.S.M.S. 1985

Election Information: Each family membership is entitled to just two votes; each individual membership is entitled to just one vote. (P.S.M.S. By-Laws, Article IV., Section 3).

FOR VICE-PRESIDENT



GILBERT AUSTIN

Field Trip Chairman and Incumbent Trustee. PSMS has substantially increased my enjoyment and appreciation of the Pacific Northwest out-of-door. I'm unhappy that I did not learn about fungi before my foreign service job took me to D.C., Finland, Pakistan, Turkey, and India. Member since 1981. Have worked on every Exhibit. Mushrooming complements my other outdoor hobby: bird watching. I want to apply my management expertise to the running of PSMS.

FOR SECRETARY



BETTY HAMILTON

Member since 1975; enjoy going on field trips; learned a lot about mushrooms and particularly enjoy the potluck dinners for the good food and good fellowship. Currently the Secretary, a job I like; have worked on every Exhibit, mostly in the book sales department. In my spare time I enjoy bowling, sewing and knitting. I am a legal secretary by training and want to contribute my know-how to the management of the Society.

BELOW ARE THE CANDIDATES FOR THE BOARD OF TRUSTEES - VOTE FOR 5

Have enjoyed helping in the many activities the Society offers to its members as well as having served one term on the Board, and want to continue a second term. I am still an enthusiastic "Sherlock Holmes" but my patrolling of the Monroe Center parking lot during membership meetings with a flashlight has shown more promise than the wild fungi in the woods last fall. In addition to assisting with the book sales, I also help with setting up the tables for our mini-exhibits at meetings.



ERNIE BOA

I have put my whole self into the Society since joining in 1980, including helping on all annual Banquets and Exhibits, and am chairing the book sales, which I love, since I meet so many of our members, and can advise them on their needs. My hobbies also include cooking and sewing and refinishing old wood. I would like to continue to serve one more term on the Board so I can give input to this great Society. Sometimes, I also have to slow down my Sherlock Holmes.



JUDI BOA



DENNIS BOWMAN

Am a High School Science Teacher by training, and was a member of the Ohio Mycological Society, before coming to Seattle and joining PSMS in 1982. I volunteered to chair our 1983 Exhibit, was co-chair last year, and will do it again this year. Currently a Trustee, I want to continue in the management of the Society and stay involved. I enjoy the field-trips and the good fellowship of our members.



ANDY GREEN

I have been an avid mushrooer since I was a tot in Ohio, but truly awakened to the challenge at the 1982 Exhibit when we joined PSMS. Have hosted several field trips and worked on all Exhibits, and last year chaired the construction committee. Helping to make all the special events and forays the best they can be, will be my goal as a Trustee - and "Happily Dedicated" will be my motto. I earn my living as a financial adviser.

I became interested in mushrooms by researching questions at the North Olympic Library System in Port Angeles where I moved in 1974. I took several mycology courses at the Peninsula Community College and found mushrooming not only fascinating but also addictive. I've been a PSMS member since I started working out of Seattle as a sales representative for library automation in '81. I am interested in facilitating the educational goals of PSMS.



MORLEY MCCALL

PSMS member since the 1982 Exhibit. The following field trips rekindled the joy and appreciation of our Washington outdoors. In addition to mushrooming, my hobbies include hiking, cooking, electronics and photography. I work in the photo finishing business. It's time for me to return the favor and give some of my time to the Society, and am willing to serve in whatever capacity is needed and my talents can best be utilized.



BRIAN READ



PACITA ROBERTS

A recent transplant to the Pacific Northwest, from Los Angeles & Okinawa, mushrooming has been a highlight of my move up here. (Nothing else could make me walk through the woods on a cold, wet dismal day!) My fascination with fungi range from culinary motivations to fungal diseases, and I hope to participate in more forays and activities with the Society. Am presently in charge of poster sales. Other interests include skiing & racquetball. Work as a statistician at the UW.



CHARLOTTE TURNER-ZILA

During my first PSMS foray to Crystal Springs campground, Mt. Saint Helens erupted. We were the last car allowed West in the ashfall. I'm still an enthusiast, in spite of this "bang-up" introduction. Working with you, our members, is a privilege and pleasure, as well as planning projects, resolving problems, and carrying out the mandates of the membership. Incumbent Trustee. Have worked on all Exhibits and chaired the 1983 Banquet.