# MushRumors

The Newsletter of the Northwest Mushroomers Association

Volume 22, Issue 3

September - December, 2011

# Fall Show Marks Unusual Year with Surprising Success

After a year in which not one month could boast of "normal" weather, the 2011 fall mushroom season was wonderfully surprising, producing some results quite different from typical years. After receiving more snow in the months of April and May than average for the entire winter in the North Cascades, followed by a wet and



Chuck Nafziger's awesome centerpiece; an authentic section of the northwest temperate rainforest

very cold June, the mushrooms in our area remained about 6 to 8 weeks behind schedule for the duration of the season. Some species, such as *Boletus edulis* delayed or missed fruiting in areas, like the Scott Paul Trail, where they normally thrive.

This could be said of nearly all of the alpine species, and many of the mycorrhizal mushrooms throughout our area, even in the lowland forests. On all my fall forays, I kept coming up empty handed. Where were all the mushrooms? By the first week of October, with the show just days away, I started to panic. In fact, I called Fred Rhoades and suggested that we get together and compile a passable photo array to appease the public's desire to

see *something* fungal at the Annual Fall Mushroom Show. Fred advised that we not be so hasty, that a lot could happen in the space of a week. Fred was correct. Fortune smiled upon us, and the autumn rains arrived, giving us three solid days of precipitation, when we, and the mushrooms, needed it the most.

We ended up not only with far more diversity than I expected, but finished with 42 more species of fungi than we have ever shown before! While it remained a very sparse year for the mycorrhizal mushrooms, the saprophytes rushed in to save the day. The woods were chock full of wood-loving decomposers, some quite rare, and some on display for the first time at our fall show.

Curiously, the chanterelles seemed to be oblivious to the odd conditions; species in the genus *Cantherellus* cropped up in very respectable numbers, and in some cases, outright abundance.

The late arrival of a myriad of mushrooms was by no means the only element of the amazing success of the 2011 Fall Exhibit. The volunteer force of collectors, tray arrangers,

photo by Vince Biciunas



The only king boletes seen at the show this year: imported from the Olympic Peninsula by Sonya

labelers, kitchen staff, and identifiers, performed impeccably to coordinate and put together an awesome set of displays by the time the doors opened at noon on Sunday to an enthusiastic throng of mycophiles. More people stepped up to help collect for the show than any other, an impressive effort in a very challenging year. Because of those volunteers, this year's show featured the largest collection of mushrooms ever assembled by the Northwest Mushroomers Association. As the chairperson of the show, I offer my congratulations and heartfelt thanks to all who worked so diligently to bring it all together. A special thanks to Dr. Fred Rhoades, our invaluable science advisor, Buck McAdoo, Christine Roberts, Erin Moore, and Larry Baxter, our team of ace identifiers. and special mention of thanks to Margaret Dilly, who, in addition to

photo by Vince Biciunas



being an identifier with the rest of the identification team, coordinates all of the fine details of assigning people to tray staging, and is responsible for supervising the arrangement of trays on the display tables, a monumental undertaking. Very honorable mention to

Chuck Nafziger for his work on the centerpiece, which is better each year, and his diligence on identifying, labeling, and staging of the plethora of polypores that made into the show, and finally, to Sonya, for traversing all the way to the Olympic Peninsula to bring back some of the most interesting fungi in the show.

I'm very glad Fred talked me out of the photo array!

photo by Vince Biciunas



# **Northwest Mushroomers Association Officers and Contact Information**

President: Peter Trenham (360) 306-8566 ptrenham@yahoo.com Vice President: Richard Morrison (360) 393-4297seeddoc07@yahoo.com Treasurer: Cris Colburn 360-738-3067 or crisc@ridewta.com Secretary & Book Sales: Margaret Sulllivan 360-724-3158 or Maggie@fidalgo.net Membership: Vince Biciunas 360-671-1559 or vbiciunas@ comcast.net Field Trip Coordinator: Bruce Armsrtong 360-595-2420 or bruce.armstrong45@gmail.com Science Advisor: Dr. Fred Rhoades fmrhoades@comcast.net

**Mailing Address:** 

**NMA** P.O. Box 28581 Bellingham, WA 98228-0581

The Northwest Mushroomers Association meets on the second Thursday of the months April, May, and June and September, October, and November, from 7 - 9 pm.

Meeting Location is back to the Bellingham Public Library. We will inform you in advance of any changes of venue. Membership dues are \$15 for individuals and families and the special price of \$10 for students. Please make checks payable to NMA and send to: Cris Colburn, membership, at the mailing address above.

Bruce Armstrong is our field trip coordinator. Field trips are scheduled for the Saturday after each meeting.

MushRumors is published every other month (roughly). Deadlines for submissions are the 15th of odd-numbered months. (Of course, exceptions will be made in the event of fungal finds of unusual import!)

Editor: Jack Waytz Phone: 360-752-1270 or gandalf5926@comcast.net MushRumors c/o Jack Waytz

P.O. Box 28581

Bellingham, WA 98228-0581 www.northwestmushroomers.org

#### **Mushroom of the Month:** Floccularia albolanaripes (Atkinson) Redhead By Buck McAdoo

One of the most colorful surprises of the October 2011 Fall Show was the enigmatic appearance of *Floccularia albolanaripes*. The fleshy yellow fruiting bodies dominated the Armillaria section, the genus where it had been before. Also known as 'The Shaggy Stalk Mushroom' if you follow Mary Wells, or 'The Scalv Bracelet' according to the McKnights, this was the first time it had arrived at our fall show. Since there are only seven Floccularias in the world, it made its presence even more special. The problem with the species at the fall shows is that so many people bring mushrooms in that we often can't match mushroom with finder. So, whoever you are, congratulations on landing 'the mushroom of the month'.



But why *Floccularia*? George Atkinson placed it in Armillaria in 1908 from a collection found by E.R. Lake from Corvalis, Oregon on November 6, 1906. There it lived for 81 years. Then in 1957, Pouzar erected the genus *Floccularia*. This was created for those species of *Armillaria* with no black rhizomorphs, fleshy fruiting bodies with some yellow in them, cap margins with appendiculate velar shards, and smooth, amyloid spores. But *Floccularia albolanaripes* is not a European species, and it took time before Dr. Redhead herded it into its proper genus in 1987.

As for identification, I had seen this species only once before. This was back at the Baker Lake foray in October of 2000. The caps had been brilliant yellow, glabrous, and viscid. This is how they often start out. The specimens seen here were merely sticky and had flattened scales and fibrils of a cinnamon-brown color. The literature tells us that this is how the species changes in appearance as it ages. Older caps can turn from yellowish to brownish. Its closest relative, *Floccularia luteovirens*, differs by having crowded, erect scales on both cap and stem. A good comparison of the two species can be seen on adjacent pages in Alexander Smith's A Field Guide to Western Mushrooms.

Caps of *Floccularia albolanaripes* are 5-15 cm wide, broadly convex and usually umbonate. They are viscid at first, then sticky as they dry. The color is bright yellow becoming pallid at the margins, and usually decorated with flattened darker scales and fibrils. Cap margins are at first inrolled and covered with the white, appendiculate veil remnants. The context is white, but yellow beneath the cuticle. According to Wells and Mitchel, the caps are sensitive to light. In Colorado they can bleach to a cream color in sunlight or be cinnamon-brown in the shade. The gills are adnexed to notched, close to subdistant, and can have straight or serrated edges. They are white at first, then yellowish in age. The stems are 3-8 cm long and 1-2 ½ cm thick. The apex is smooth and white to pale yellow. Then there is an abrupt change. The rest of the stem is sheathed in a belt of dense white to yellowish cottony scales with brownish tips. The top of this sheath is a ring of the white cottony velar remnants that separated from the cap margin. A gorgeous photo of this can be viewed at Mykoweb.com. Atkinson reported the stems to be hollow. The odor and taste are reported as mild by all authors except for Wells & Mitchel, who found the taste to be sour and acrid when raw.

Along the west coast, *F. albolanaripes* is found mostly with alder and oak from fall through winter down into California. David Biek found it with yellow pine and oak through spring in Northern California. Wells & Mitchel reported it as common in high aspen meadows in Colorado in the summers. Barrows found it in New Mexico under mountain conifers. Dr. Dennis Thurber found it at Aspen, Colorado with Engelmann spruce. And Jack States thought so much of it that he put it on the cover of his popular guide, Mushrooms and Truffles of the Southwest. Calvin Kauffman found it in the Olympics in 1922, but disagreed with Atkinson's spore sizes. (Just

for the record, we looked at the spores and came up with 3.9-5.2 x 5.4-7.4 microns, which were closer to Atkinson's.)

In 1976, Smith & Mitchel found an albino form, which they introduced as *Armillaria albolanaripes* form alba. It is reputed to be one of the world's most beautiful mushrooms. As for the typical form, you can't confuse it with much. *Floccularia pitkinensis* has fleshy grayish caps with tinges of yellow. *Amanita franchettii* differs by having free gills, yellow warts on the cap, and loose yellow velar material on the stem. Jack States felt that they looked like large yellow *Pholiotas*, except for the habit of growing on the ground and the white spores instead of rusty ones. Otherwise, *Floccularia albolanaripes* seems a fairly safe mushroom for beginners.

And this brings up edibility. The Shaggy Bracelet has long been considered inferior to its floccose cousin, *Floccularia luteovirens*, highly esteemed in Europe and the Rockies. Here now is a sampling of the opinions from popular guides:

Wells & Mitchel - 'Edibilty unknown'.

David Biek - 'Of little value as an edible'.

Jack States – 'Edible but lacks the quality of *Armillaria straminea*', (an earlier name for *F. luteovirens*.)

David Arora – 'Edible but insipid'.

Helene Schalkwijk-Barendsen – 'The taste is bland'.

McKenny, Stuntz, & Ammirati – 'Of uncertain edibility'.

Mike Woods of Mykoweb – 'Edible and excellent. A greatly under-appreciated mushroom'.

Well, as far as I'm concerned, Woods has got it right. I took three of the specimens from the show down to my boat galley. Simply sautéed in butter, they were among the ten best mushrooms I've ever tasted. Besides having just the right ratio of crunchy exterior and juicy interior, the flavor had a gourmet aftertaste that brought up visions of manna. I can only attribute its lukewarm reception to circumstance. *Cortinarius caperatus* comes to mind. I have eaten it four times and only once considered it choice. The other three samplings were insipid to poor. Maybe both of these species have to be in prime condition and with the proper substrate in order to taste good.

For those increasing members in our club who enjoy microscopic characters, we discovered that *Floccularia albolanaripes* had no cystidia whatsoever. It had parallel gill trama with hyphae 5-11.4 microns wide. The clavate basidia were 4-spored and measured 6.8-7.8 x 34-36 microns. Spores were smooth and ellipsoid. The pileipellis consisted of radially repent hyphae measuring 6-12 microns wide. A.H. Smith noted occasional clamps and a particularly narrow subhymenium in the gill trama. He and Mitchel also noted that the central strand in the gill trama tended to be more inflated than the surrounding hyphae. We didn't see this phenomenon, but it doesn't mean it couldn't happen.

Meanwhile, keep your eyes open. Although possibly a first for Whatcom County, more could follow. If you don't want to risk eating them, bring them to one of our experts. We'll exert a tax or consume the whole collection if you prefer.

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#### 2011 Fall Show Observations and Report

By Buck McAdoo

It's always a wild card on how the annual weather patterns impact the mushrooms. This year was rather untypical in that the snow pack remained at high elevations all through the summer months. I doubt if Artist's Point ever did open. One of the reasons for this was our unusually cool, wet summer. It seemed to rain off and



Rivetting discussion at the Touch and Feel table with Harold Meade

on all through July and into August, with summer finally arriving in September. Since fungi require moisture, I speculated that this would be the most bountiful fall we ever had. When Steve Trudell advised us in September that this would not be a good mushroom year, I couldn't fathom the connection.

As the fall progressed with no reports of *Boletus edulis*, and just occasional sightings of our ubiquitous chanterelles, Steve's prediction seemed more accurate than not. The final blow came just a week before our show. Fred Rhoades organized a foray at Silver Lake. Half the forayers stayed around Silver Lake. The rest of us drove off to one of my favorite collecting sites up the Hannegan Pass Rd. Except for one magnificent fruiting of the earth star, *Geastrum saccatum*, there was nothing else there. Just acres of moist, undulating moss with

not even an *Inocybe* to break the green. The people at Silver Lake fared a lot better, but it was still way below normal for this time of year. Our Fall Show chairman was even heard to be muttering about canceling the show. There was the suggestion that we could have photos of mushrooms on all the tables. Another idea was to fill the tables with *Gymnopus peronatus*. Maybe the public could be appeared by the quantity and not notice so much the lack of diversity.

Then came the show. To me, anyway, it was like the New York Mets winning their first World Series. Nature somehow came through. Lo and behold, boxes of unusual things began arriving at Bloedel-Donovan from all

over the state. Vince had gone all the way out to Easy Pass on Highway 20. Sonia had covered the Olympic Peninsula. Fred had stopped by his favorite sites on the way back from Spokane. Jairul brought a desiccated clump of the blue-black chanterelle from the show at Everett the week before. These are just the endeavors we knew about. But the entire club must have gone to similar lengths because from seemingly nothing, we broke the club record for different species at the fall show! At one point I heard the number as 297 species. Since then, Fred has adjusted the list to eliminate redundancies and perhaps add a few species that had lost their identification cards.

Each season is totally different. Two years ago, *Russula* boxes almost extended all the way across the room. Last year,



Cortinarius ruled. But this year was the year of the Pholiota. There seemed to be more boxes of Pholiota than

anything else, an odd thing for a genus that usually peaks here in November, especially considering that the accompanying fungi were mostly composed of species that show up here in September. Lisa McAvoy and her team of helpers did a bang-up job of getting these *Pholiotas* on the table. We even saw *Pholiota albocrenulata* for the first time.

But everyone involved deserves praise. Folks I hardly knew were scurrying around identifying things at a rate I hadn't seen before. As a club, I believe we have turned a corner. At some point around mid-afternoon, I drifted around the tables looking for obvious misidentifications. There really weren't any! Just in case I missed something, I asked new member Kevin Bi, a keenly perceptive connoisseur from White Rock, to make the rounds also. He questioned *Suillus lakei* and *Lepiota brebissonii*. I would have questioned the latter also if Steve Trudell hadn't set us straight in September. *Suillus lakei* and *Suillus cavipes* only differ visually in the presence of a hollow stem in the latter. When the stems turned out to be solid, it looked like we had done our homework. I seriously doubt whether any other club of our size in America has as many good identifiers.

A lot of the credit has to go to Fred and Margaret. Both have taught mushroom identification classes for years. They both deserve the annual NAMA award for contributions to mycology. For this fall show, they both worked hard on streamlining the identification process ahead of time. There were new lists of fungi showing what we already had labels for. Species names in blue indicated there was a more modern name for that species that could be looked up in another list. For the larger genera, the names of species in their boxes were all in alphabetical order. This is a huge factor when you are pressed for time. There were, of course, some minor snafus. The labels for the Birds' Nest fungi couldn't be found at first. A few specimens brought to the show were reported as lost. This is always agonizing for the person who brought them. Sometimes they are found again, and sometimes not. It's become part of the mystique of the fungi.

All in all, this year's show represented an amazing effort by both those who went out and found the mush-rooms and those who identified them later. You all know who you are. There are now just too many of you to list you individually. We can now reserve that list for the fungi.

# 2011 Lummi Island Foray: My First Host

# By Richard Mollet

Nope, I'm not referring to white wafers but rather my first experience hosting a foray (10/22/11). I awoke at 7:00 AM to a pouring rain. Hoping that the weather would improve I showered, ate breakfast, dressed and by 8:30 the pour had increased to deluge status. Adopting an "it is what it is what it is" attitude I set out wondering if anyone would show up at the Gooseberry Point rendezvous (one never knows about shroomers). As I turned onto Haxton by Casino Corner the rain started to let up and by 9:20 the sun began to shine.





Lummi Island turning out to be a mushroom treasure trove.

At 9:45 witnessed the arrival of nine other intrepid club shroomers and off we went to the Otto Preserve on Lummi Island. We had no sooner arrived than we were joined by about 15 islanders, who unbeknownst to me had been invited to share our foray. I explained that we were not elitists and they were welcome to share whatever we had.

Groups spread out over the vast acreage while I set up the "kitchen" and Buck set up an identification area in the lodge. I then took a short walk outside and soon espied my first blewit (*Lepista personata*). I'd seen photos and examples at our fall show but never found one in situ.

After about two hours, seekers started to return with

quite a plethora of mushrooms, easily at 50-60 types. Everyone was feeling good with what they found and some were looking forward to a tasty supper at home. Speaking of which, the potluck lunch was quite interesting itself.

We remembered to save our identifying labels as someone had indicated that Fred Rhoades wished to compile a catalogue of Lummi Island mushrooms. Just as I closed the trunk lid of my car it started to rain again. It is what it is what it is.



# **Bowman Bay Field Trip November 5, 2011**By Margaret Dilly

On a beautiful fall morning in November we arrived at Bowman Bay State Park to find Maggie Sullivan our faithful member had already set out the signs and was hauling the club supplies up to the shelter. This area was closed for the winter so toilet facilities were a bit of a walk away but as opposed to last year we did have run-

photo by Vince Biciunas



Ace identifiers Dick Morrison and harold Meade pour over Bowman Bay fungi

ning water at the site. Soon with the help of a few other early arrivals who had already found some nice specimens, tables were moved around and set ready for the day. Claude made a nice roaring fire and the day began with coffee and cookies. Soon, baskets were in hand and the eager hunters dispersed in all directions. The hunt began.

Soon Larry Baxter and Kay Kelly arrived from Camano Island. Larry spent the day at the ID table with me, sorting and identifying mushrooms. More members and friends arrived as the day went on, among them who were able to help with the identification, were Dick Morrison, Harold Mead, Evan Sanford and Chuck Nafziger. The collections varied from a tiny *Strobilluris tullisatus* and a beautiful collection of *Phaeolepiota aurea*. As impressive as they are, eating them is not

recommended. Just ask Jack. New and old members alike were very helpful throughout the day with the display and showed great interest in learning more about ID. The fall identification class should fill quickly. We didn't

have time to identify all species but of those we did came to 66 (listed in the Species Annex, at the back of this issue). This is good for this year and the short time we had to hunt...

Thirty three people signed in and shared a wonderful potluck lunch. As always Fien was at the stove cooking up hot goodies for all to savor. Thanks to one of our generous members, chanterelles (*Cantharellus formosus*) were donated, cooked up and enjoyed by all. No Blewitts (*Lepista nuda*) were found. Traditionally this area produces them in abundance every year, but not one appeared this year. The strange weather conditions we have seen have definitely affected the fungal fruiting this year. It began to cool by early afternoon and the clean up began.



Hunters gathered up their baskets with a few specimens they wanted to keep and headed for home. Maggie and Harold and several loyal members helped with clean up. All in all it was a successful fall outing. Now we can all look forward to the new mushroom year starting with the Survivors Banquet, March 3rd, and Morel Madness in May.

Be thinking of volunteering to help for both of these events. I look forward to seeing all of you then.

#### 2012 NMA MONTHLY MEETING SPEAKERS

By: Dick Morrison

DATE April 12	SPEAKER Richard Winder Pacific Forestry Center	TOPIC Morels	LOCATION Bellingham Central Library
May 10	,	Moreis	
May 10	Oluna & Adolf Ceska VMS, Vancouver, Can	Mushrooms of Observatory Hill	Bellingham Central Library
June 14	Daniel Winkler Mushroamers	PNW Mushrooms	Bellingham Central Library
Sept 13	Britt Bunyard FUNGI magazine	Aflatoxins to Zombies	Bellingham Central Library
Oct 11	David Arora*	Mushroom Stories	WWU, details TBA
Nov 8	Jennifer Hahn Pacific Feast	Foraging for Wild Mushrooms	Bellingham Central Library

<sup>\*</sup>Look for much more information on David Arora's visit in the next issue of MushRumors

# "SPONGEBOB" MUSHROOM NAMED Truth Stranger Than Fiction?

Christine Dell'Amore

National Geographic News, June 16, 2011

The new species, Spongiforma squarepantsii—found in 2010

in Sarawak, Malaysia—has a spongy appearance that reminded scientists of TV's Spongebob Squarepants.

"It's just like a sponge with these big hollow holes," San Francisco State University's Dennis Desjardin said in a



statement. "When it's wet and moist and fresh, you can wring water out of it and it will spring back to its original size. Most mushrooms don't do that." There's only one other species known so far in the Spongiforma genus; it lives in central Thailand and has a different color and odor. S. squarepantsii has a bright orange hue and smells "vaguely fruity or strongly musty," according to the study, published in May in the journal Mycologia. When Desjardin and colleagues looked at the new mushroom under a scanning electron microscope, they

found even more spongy similarities—for instance, the spore-producing area of the fungus resembles a seafloor carpeted in tube sponges. One thing's for certain—there are more, more weird fungi out there. Only five percent of Earth's fungi species have been found, and there may be up to three million still unknown.

#### Silver Lake Foray October 1, 2011

Agaricus albolutescens

Agrocybe praecox

Agrocybe sp.

Albatrellus flettii

Amanita fulva

Bolbitius vitellinus

Boletus chrysenteron

Boletus zelleri

Cantharellus formosus

Clitocybe connata

Coltricia perennis

Conocybe tenera

Coriolus versicolor

Coprinopsis lagopus group

Coprinellus micaceus

Crepidotus applanatus

Cystoderma terrei

Fomes fomentarius

Fomitopsis pinicola

Ganoderma applanatum

Geastrum saccatum

Geastrum triplex

Gomphus floccosus

Gymnopilus ventricosus

Gymnopus confluens

Gymnopus peronatus

Hypomyces lactifluorum

Inocybe calamistrata

Inocybe sororia

Jahnoporus hirtus

Lactarius obscuratus

Lactarius scrobiculatus

Leccinum scabrum

Mycena aurantiidisca

Mycena filopes

Mycena galericulata

Nidula candida

Panaeolina foenisecii

Paxillus involutus

Peziza repanda

Phaeolus schweinitzii

Pholiota flammans

Pholiota squarrosa

Pleurotus elongatipes

Pluteus cervinus

Pluteus lutescens?

Polyporus badius

Polyporus melanopus

Psathyrella torpens?

Ramaria stricta

Russula sp.

Russula brevipes

Russula brunneola

Russula dissimilans (formerly R. nigricans)

Russula isabelliniceps

Russula occidentalis

Russula placita?

Russula xerampelina

Scleroderma fuscum

Sparassis crispa

Strobilurus trullisatus

Tapinella atrotomentosa

Thelephora palmata

Tricholomopsis decora

Lichens

Lobaria oregana

Peltigera canina

Peltigera neopolydactyla

#### **Lummi Island Foray Species List**

The species list for the October 22, 2011, foray at the Otto Preserve consisted of 80 species, not all readily identifiable. This preserve is turning out to be such a good fungal site that it might be worth while for the preserve to invest in a copy of Mushrooms Demystified for detailed referencing. While the vast majority of species found on this foray were common to the mainland, a few odd things occured that we hadn't seen before. I'll bring those up after the list.

The List

Agaricus hondensis

Lepiota decorata

Agaricus 'moelleri'

Lepiota sequoiarum

Armillaria nabsnona

Lepista nuda

Armillaria solidipes

Leucoagaricus leucothites

Arrhenia sp.

Leucoagaricus rubrotinctoides

Ascocoryne 'sarcoides'

Leucopaxillus amarus

Boletus chrysenteron

Lycoperdon perlatum

Cantharellus formosus

Marasmiellus candidus

Cheimonophyllum candidissimum

Melanoleuca melaleuca

Chlorophyllum olivieri

Mycena adonis

Clitocybe connata

Mycena alcalina group

Clitocybe deceptiva

Mycena citrinomarginata

Clitocybe inversa

Mycena pura

Clitocybe sp.

Nolanea hebes

Clitocybula atrialba

Panaeolina foenisecci

Clitopilus prunulus

Paxillus involutus

Coprinus comatus

Phaeolus schweinitzii

Cortinarius mucosus group

Phlebia radiata

#### By Buck McAdoo

Crepidotus sp.

Phlebia tremellosa

Cystoderma terrei

Pleurotopsis longinguus

Fomitopsis cajanderi

Pluteus cervinus

Fomitopsis pinicola

Polyporus varius

Galerina sp.

Pseudohydnum gelatinosum

Galerina sp.

Rickenella fibula

Geastrum saccatum

Russula fragilis

Geastrum triplex

Russula murrillii

Gomphidius subroseus

Russula veternosa

Gymnopilus sapineus group

Russula xerampelina

Gymnopus dryophilus

Spathularia flavida

Gymnopus peronatus

Stereum gausapatum

Hebeloma crustuliniforme

Stereum hirsutum

Heterobasidion annosum

Strobilurus occidentalis

Hygrophoropsis aurantiacus

Strobilurus trullisatus

Hypholoma fasciculare

Stropgharia ambiguum

Hypomyces chrysospermus

Suillus caerulescens

Hypomyces lactifluorum

Suillus lakei

Lactarius luculentus var. laetus

Tapinella atrotomentosa

Lactarius obscuratus

Trametes versicolor

Lepiota cristata

Xeromphalina campanella

Xeromphalina cornui

Xylaria hypoxylon

continued on page 11

Sometimes you will see the word 'group' after a species name. This generally means the species is part of a complex of close relatives or look-alikes and would require both microscopic and DNA analysis to get to the correct name. The name is likely to be the correct name in the popular guides and maybe sufficient for the purposes of the Otto Preserve. If you a species name in parenthesis, it means there could be some question over it, or a name change is in the works. In the case of Agaricus 'moelleri' in the list above, the name 'moelleri' belongs to a species from Europe, and ours will soon be getting a new name since it differs markedly in DNA profiling. In the case of Ascocoryne 'sarcoides', a little purple subgelatinous species on wood, the fruiting bodies were so distorted that they did not resemble the cupular shapes normally associated with the species. Sadly, the specimen was lost on the identification table.

One of the most interesting species was found by Richard Mollette, our foray host. This was a flabby and fragile grayish Clitocybe in the lawn not far from the front door. It might have been the morbid Clitocybe, Clitocybe morbifera, but I didn't collect it for study because I had left my camera behind due to heavy rain at the time of departure. Ditto, for the lawn Galerinas. One looked like photos of Galerina hypnorum, the other Galerina graminea. But you can't name the species in this genus without microscopic verification since so many of them look alike.

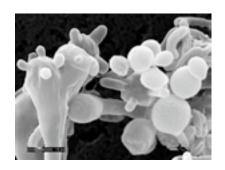
Lummi Island harbors interesting fungi. The only Limacella (a genus that looks like Amanita with a slimy cap surface) I've ever seen in the state came from this island. It was Limacella roseicremea, a cream colored species with a pinkish tinge. Nancy Burnette brought it to one of our club meetings back in the day.

# **FUNGUS SPREADS SOUTH FROM B.C., BECOMES MORE DEADLY** *various sources* (Featured in PSMS Sporeprints, June 2010)

It sounds like a villain from a science fiction film. Cryptococcus gattii—an airborne fungus that appeared on Vancouver Island in the late 1990s—is real, and it's gathering strength as it spreads to the south. According to research published April 22 in the journal Public Library of Science Pathogens, it has mutated into a more lethal strain since it moved into Oregon. The fungus has now spread to California.

So far, Washington cases of cryptococcosis caused by C. gattii have been reported in Whatcom, King, and San Juan counties. "The cases in Washington—and there's only been eight or nine of them—are strongly linked to the British Columbia strain," said Dr. Tom Locke, public health officer for Clallam and Jefferson counties.

Fortunately, though potentially deadly to humans and animals infections of C. gattii are still rare. According to the Oregon Department of Human Services (April 26, 2010), since 2004 about 50 people have been identified



with the illness in Washington, Oregon, and California and about 10 people have died. Cryptococcus gattii is not transmitted from person to person or carried by insects or animals. Rather, the fungus forms spores that are blown in the wind or moved by disturbances of the soil. People who stir up the soil—landscapers, loggers, outdoor recreationalists— are the most likely to encounter the fungus. Besides being spread by the wind, the fungus can be spread by humans on shoes and even on car tires.

The spores are inhaled and colonize the lungs before they spread throughout the body. Symptoms include shortness of breath, chest pain, long-lasting coughs, fever, and headaches—even weeks after exposure. Most cases

are like a pneumonia that slowly gets worse and worse. Treatment involves six to eight weeks of intravenous antifungal medications followed by months of pills.

**2011 Fall Show Species List** *Compiled by* 

Fred Rhoades and margaret Dilly

Now 291 (179 gilled, 96 nongilled, 12 lichens,

4 slime molds)

Ascomycota

Aleuria aurantia "Orange fairy-cup"

Bisporella citrina

Chlorencoelia versiformis

Chlorociboria aeruginascens "Green stain cup"

Gyromitra infula "Hooded false morel"

Helvella solitaria

Hymenoscyphus sp.

Hypomyces chrysospermus

Hypomyces lactifluorum "Lobster mushroom"

Otidea onotica

Peziza arvernensis

Tarzetta cupularis

Xylaria hypoxylon "Candlesnuff fungus"

Gasteromycetes (Puffballs, etc.)

Bovista plumbea

Crucibulum laeve

Cyathus stercoreus

Cyathus striatus

Geastrum saccatum

Geastrum triplex

Lycoperdon (Morganella) pyriforme

Lycoperdon nigrescens (L. foetidum)

Lycoperdon perlatum

Lycoperdon umbrinum

Scleroderma bovista

Scleroderma cepa

Truncocolumella citrina

Vascellum lloydianum (V. pratense)

Jelly Fungi

Calocera cornea

Dacrymyces chrysospermus (D. palmatus)

Pseudohydnum gelatinosum

Tremella mesenterica

Tremiscus (Phlogiotis) helvelloides

Boletus chrysenteron

Boletus edulis "King bolete"

Boletus fibrillosus

Boletus mirabilis "Admirable bolete"

Boletus zelleri

Chalciporus (Boletus) piperatus

Leccinum holopus

Leccinum scabrum "Birch bolete"

Phylloporus rhodoxanthus "Gilled bolete"

Suillus caerulescens

Suillus lakei

Suillus luteus "Slippery jack"

Polypores, crusts & the like

Antrodia serialis

Bondarzewia mesenterica (B. montana)

Cerrena (Daedalea) unicolor

Chondrostereum (Stereum) purpureum

Coltricia cinnamomea

Coltricia perennis

Daedaleopsis confragosa

Fomes fomentarius

Fomitopsis (Fomes) cajanderi

Fomitopsis officinalis

Fomitopsis pinicola

Ganoderma applanatum

Ganoderma oregonense (G. tsugae)

Heterobasidion (Fomes) annosum

Janoporus (Polyporus) hirtus

Laetiporus conifericola (L. sulphureus)

Lenzites betulina

Oligoporus leucospongia

Phaeolus schweinitzii

Phlebia tremellosa

Piptoporus betulinus

Polyporus melanopus

Pycnoporellus alboluteus

Pycnoporus cinnabarinus

Stereum hirsutum

Thelephora terrestris

Trametes (Coriolus) versicolor

Trametes (Coriolus) hirsuta

Tyromyces chioneus

Teeth fungi

Hericium abietis "Coral Hydnum"

Hydnellum peckii

**Boletes** 

Hydnellum regium

Hydnum (Dentinum) repandum "Hedgehog mush-

room"

Corals

Artomyces (Clavicorona) pyxidatus

Clavaria vermicularis Clavariadelphs truncatus

Clavulina cinerea Clavulina cristata Clavulinopsis laeticolor

Ramaria abietina

Ramaria acriccesiscens Ramaria araiospora

Ramaria cystidiophora var. fabiolens Ramaria sandaracina var. euosma Sparassis crispa "Cauliflower fungus"

Chanterelles

Cantharellus formosus (C. cibarius) "Pacific golden

chanterelle"

Cantharellus subalbidus "White chanterelle"

Craterellus (Cantharellus) tubaeformis "Winter chant-

erelle"

Gomphus bonarii

Gomphus clavatus "Pig's ears"

Gomphus kaufmanii

Polyozellus multiplex "Blue chanterelle"

Agarics (gilled)

Agaricus augustus "The prince" Agaricus bitorquis (A. rodmani)

Agaricus campestris "Meadow mushroom"

Agaricus cupreobrunneus

Agaricus integer

Agaricus moelleri (A. praeclaresquamosus)

Agaricus nivescens Agaricus silvaticus Agrocybe paludosa Amanita aprica Amanita gemmata

Amanita muscaria "Fly Amanita" Amanita smithiana (A. solitaria)

Ampulloclitocybe (Clitocybe) avellaneoalba Ampulloclitocybe (Clitocybe) clavipes

Armillaria solidipes (A. ostoyae, A. mellea) "Honey

mushroom"

Asterophora parasitica

Cantharellula (Clitocybe) umbonata

Catathelasma ventricosum

Cheimonophyllum (Pleurotus) candisdissimum

Chlorophyllum (Lepiota) olivieri

Chlorophyllum (Lepiota) rachodes "Shaggy parasol" Chroogomphus tomentosus "False wooly chanterelle"

Chrysomphalina (Omphalina) chrysophylla

Chrysomphalina aurantiaca (Omphalina luteicolor)

Clitocybe connata (C. dilatata)

Clitocybe dealbata "Sweat-producing Clitocybe"

Clitocybe deceptiva Clitocybe diatreta Clitocybe odora Clitocybe sinopica

Clitocybula (Clitocybe) atrialba

Clitopilus prunulus "Sweetbread mushroom"

Collybia cirrhata

Coprinellus (Coprinus) micaceus "Mica caps"

Coprinopsis atramentaria "Inky caps" Coprinus comatus "Shaggy mane"

Cortinarius (Rozites) caperatus "Gypsy mushroom"

Cortinarius acutus Cortinarius alboviolaceus Cortinarius anomalus Cortinarius vanduzerensis

Cortinarius violaceus "Violet Cortinarius"

Cortinarius sp. (green corn) Crepidotus applanatus

Crepidotus epibryus (C. herbarum)

Cystodermal (Cystoderma) cinnabarina (Cystoderma

terreyi)

Entoloma rhodopolium

Floccularia (Armillaria) luteovirens

Gomphidus subroseus
Gompidius glutinosus
Gompidius smithii
Gymnopilus bellulus
Gymnopilus croceoluteus
Gymnopilus penetrans
Gymnopilus punctifolius
Gymnopilus spectabilis

Gymnopus (Collybia) acervatus Gymnopus (Collybia) confluens Gymnopus (Collybia) peronatus

Hebeloma incarnatulum (H. crustuliniforme)

Hebeloma mesophaeum Hebeloma sacchariolens Hebeloma sp.

Hemimycena (Mycena) delectabilis Hemimycena (Mycena) delicatella

Hygrophoropsis (Clitocybe) aurantiaca "False chanter-

elle"

Hypholoma (Naematoloma) capnoides Hypholoma (Naematoloma) dispersum Hypholoma (Naematoloma) fasciculare

Inocybe chelanensis Inocybe geophylla Inocybe griseolilacina Inocybe hirsuta var. maxima

Inocybe lilacina Inocybe pudica Inocybe sororia

Laccaria amethysteo-occidentalis (L. amethystina)

Laccaria bicolor Laccaria laccata Laccaria sp.

Lactarius deliciosus Lactarius hepaticus Lactarius kauffmanii Lactarius luculentus Lactarius olympianus

Lactarius rubrilacteus (L. sanguifluus)

Lactarius rufus

Lactarius subflammeus Lactarius torminosus Lactarius uvidus Lactarius sp.

Lepiota rubrotinctoides (L. rubrotincta) Lepista (Clitocybe) inversa (C. flaccida)

Lepista (Clitocybe) irina

Lepista sp.

Leptonia formosa Leptonia gracilipes

Leratiomyces ceres (Hypholoma aurantiacum, Stro-

pharia aurantiaca)

Leucoagaricus leucothites (Leucoagaricus naucinus,

Lepiota naucina)

Leucocoprinus (Lepiota) brebissonii

Lyophyllum decastes Marasmius copelandii Marasmius oreades Melanoleuca melaleuca

Mycena adonis (M. amabilissima)

Mycena amicta Mycena aurantiidisca Mycena clavicularis Mycena elegantula Mycena epipterygia Mycena galericulata Mycena haematopus Mycena oregonensis

Mycena pura

Mycena purpureofusca

Mycena robusta (M. plumbea)

Mycena rosella

Mycena stipata (M. alcalina)
Mycena strobilinoides
Mycena vulgaris
Mycena spp.

Nolanea bicoloripes Omphalina sp. Paxillus involutus

Phaeocollybia kauffmanii

Phaeocollybia sp.

Phaeolepiota (Pholiota) aurea

Pholiota albocrenulata Pholiota astragalina Pholiota aurivella Pholiota decorata Pholiota flavida Pholiota limonella Pholiota malicola

Pholiota malicola var. macropoda Pholiota (Kuehneromyces) mutabilis

Pholiota squarrosa Pholiota squarrosoides Pholiota terrestris

Pleurocybella (Pleurotus) porrigens Pleurotus pulmonarius (P. ostreatus)

Pluteus cervinus Pluteus lutescens Pluteus pellitus Pluteus sp.

Psathyrella gracilis Psathyrella hydrophila

Psathyrella sp.

Pseudoarmillariella ectypoides Rhodocollybia (Collybia) butyracea

Russula aeruginea Russula brevipes Russula crassotunicata

Russula dissimulans (R. nigricans)

Russula eleaodes Russula exalbicans Russula farinipes Russula fragilis Russula murrillii

Russula sanguinaria (R. rosacea)

Russula silvicola Russula sphagnophila

Russula xerampelina "Woodland Russula", "Shrimp

mushroom"

Russula xerampelina var. isabelliniceps Schizophyllum commune "Splitgill"

Strobilurus (Collybia) trullisatus "Cone lover"

Stropharia aeruginosa Stropharia ambigua Stropharia hornmannii Stropharia rugosoannulata

Tapinella (Paxillus) atrotomentosa

Tricholoma flavovirens Tricholoma imbricatum Tricholoma saponaceum Tricholomposis decora Tubaria furfuracea

Xeromphalina campanella

Xeromphalina cornui

Lichens

Cladonia carneola Cladonia transcendens Evernia prunastri

Hypogymnia imshaugii

Lichenomphalia (Omphalina) umbellifera (O. ericeto-

rum)

Lobaria oregana Lobaria pulmonaria Peltigera neopolydactyla

Ramalina farinacea Ramalina menziesii Usnea filipendula Usnea longissima

Slime molds
Fuligo septica
Lamproderma sp.
Lycogala epidendrum
Stemonitis fusca
Trichia sp.

# Species List, Bowman Bay Foray, November, 2011

#### GILLED MUSHROOMS

Agaricus augustus Agaricus campestris Agaricus comtulus

Agaricus moelleri (A. prae-

claresquamosus)

Amanita muscaria "Fly Amanita"

Armillaria sp. Clitocybe terrestris Clitocybe fragrans Clitocybe candicans

Clitocybe sp.

Chlorophyllum brunneum Chroogomphus tomentosus Chrysomphalina (Omphalina) au-

rantiaca)

Clitocybe connata (C. dilatata)

Clitocybe inversa Collybia sp. Cortinarius sp. (4) Gomphidius oregonensis Gomphidius subroseus Gymnopilus sapineus

Gymnopilus sp.

Gymnopus dryophilus Hebeloma crustuliniforme?

Hygrophoropsis (Clitocybe) auran-

tiaca "False Chanterelle"

Hypholoma (Naematoloma) fas-

ciculare

Inocybe geophylla Inocybe lilacina Inocybe sp.

Laccaria amethysteo-occidentalis

(L. amethystina) Laccaria laccata Lepiota clypeolaria Leucopaxillus albissimus

Marasmiellus (Marasmius) candi-

dus (M. magnisporus)

Mycena epipterygia var. epipterygia

Mycena pura Nolanea sericea Paxillus involutus Pholiota terrestris Pluteus cervinus Russula fragilis Russula sp. Russula xerampelina Stropharia ambigua Tricholomopsis rutilans Tricholoma pessumdatum

#### NON GILLED MUSHROOMS

Alurea aurantia Cantharellula umbonata Cantharellus formosus (C. cibarius)

Fomitopsis pinicola Morganella pyriformis Otidia onotica Pseudohydnum gelatinosum Ramaria sp. Sarcodon scabosus Scleroderma cepa Suillus brevipes Suillus caerulescens Suillus lakei Suillus sp. Suillus tomentosus

## Last Look at the Bizarre Season of 2011 (That Ran Into 2012) By Jack Waytz

Just when it seemed that mycorrhizals had taken the year off...

On a warm, wet January 8th, I was walking up the logging road opposite Gate 9 of Sudden Valley, when I

photo by Jack Waytz



January yellowfoots (yellowfeet?) Out with a

finding the yellowfoot in years past. When we arrived at our destination, I could hardly believe what we found. In an area no larger than 200 square feet, we gathered enough of these diminutive treats to fill a basket: fully 4.75 pounds worth! At around 15 mushrooms to an ounce, this constitutes several hundred mushrooms! How was so much energy available from the conifer hosts in the dead of winter to support such a massive fruiting of these tasty mushrooms? Yet another mycomystery to ponder. The next morning, the temperature fell to about 19 degrees, and two days after that, the mountain was under more than two feet of snow. Timing really is everything!

had a feeling I should check one of the mossy berms just a few yards from Lake Louise Road for hedgehog mushrooms - despite the lateness of the season, and the fact that it had frozen hard several days here. Over the years, I have learned to trust my "spidy sense" for mushrooms, in, or out, of season. As it turned out, I did not find any hedgehogs, but there were several decent sized clumps of Cantherellus tubaeiformis (vellowfoot chanterelles) there - in prime condition. This prompted me to set forth the next morning, accompanied by friend and recent addition to our club, Jen Green, on an expedition up the Galbraith Mountain, to an area that I had luck

photo by Jack Waytz

