

Plant Science Says



Happy
Valentine's
Day!

February, 2001

MAES Planning Conference

The Variety Release Conference took place January 22-24 in the SUB. Varieties of the following were discussed for recommendation and/or release and voted upon: Lentil-Dave Wichman, barley-Tom Blake, alfalfa-Ray Ditterline, oats-Pat Hensleigh, wheat-Luther Talbert, ponderosa pine-Joe Scianni, and bluegrass-Mark Majerus.

Bob Gough Award

Bob Gough, Extension Service horticulturist, has been named a fellow of the National Association of Colleges and Teachers of Agriculture.

There are several fellows selected each year, but Gough was first to be chosen based on Extension Service teaching. Gough was nominated by a professor from North Carolina State University.

Award recipients are chosen by a national committee of peers after review of their teaching effectiveness and letters of recommendation from peers and students. Nominees must have been engaged in teaching in agricultural disciplines for at least five years, must be an active member of NACTA, and must have made significant contributions to the teaching field.

Gough joined the faculty at MSU in 1995 after serving several years as editor and assistant publisher at the Haworth Press, Inc., a major publisher of scientific refereed agricultural periodicals. As MSU's Extension horticulturist, he has a series of mass media programs aimed at educating people in horticultural matters, including radio, television, newspapers and the Internet.

He received his doctorate in botany from the University of Rhode Island in 1977 and is a member of the American Society for Horticultural Science, the American Association for the Advancement of Science and several honorary organizations.

2001 Montana / Wyoming Sugarbeet Symposium

The 2001 MT/WY Sugarbeet Symposium was held January 15 and 16 in Billings. There were more than 412 sugarbeet, dry bean, barley or corn growers and associated agribusiness persons in attendance. The Symposium is held every two years and is sponsored by the MT Agbusiness Association, the Wyoming Agbusiness Association, Montana State University, and the University of Wyoming. This year we had attendees from MT, WY, ND, ID, NE, CO and Canada. The first days program focused on irrigated crops grown in rotation with sugarbeets. MSU associated speakers included Drs Gary Brester (Ag. Econ.), John Patterson and Jan Bowman (Animal and Range Sciences), Sue Blodgett (Entomology), A.J. Busan (LRES), Ken Kephart and Jim Mickelson (Southern Agricultural Research Center-SARC) and Jack Riesselman and Barry Jacobsen (Plant Sciences and Plant Pathology). The second day focused solely on sugarbeets and MSU associated speakers included Jim Mickelson (SARC), Gary Brester (Ag. Econ) and Nina Zidack and Barry Jacobsen. The complete program can be found on the web at: <http://scarab.msu.montana.edu/sugarbeet/>. Abstracts of talks will be posted at this site by mid February. Barry Jacobsen served as program chair.

Herbarium News 2000

by Cathy Seibert

The Herbarium just received its fourth Montana County Extension plant specimen submitted for identification in the year 2001 (today it was *Opuntia fragilis* (Nutt.) Haw. or "Brittle Pricklypear" from the Billings area) so I decided it was about time for a few notes on the Herbarium's activities last year. Although the Herbarium (via Matt Lavin and Cathy Seibert) identifies numerous plants every year for graduate students, professors, and Herbarium visitors, Cathy also identifies a variety of plants for the Montana County Extension Offices across the State in her role as the Extension Plant Taxonomist. During 1999, almost 600 extension plant samples were identified by Cathy at the Herbarium and 570 extension plants were submitted for identification in 2000.

Notable plant species received during the 2000 field season included the following: *Azolla mexicana* Presl or "Water/Mosquito Fern" was submitted for the second year in 2000 from Ravalli County. The 1999 specimens from the Stevensville vicinity were Montana's first record for this aquatic species which is a member of the Water Fern Family or Salviniaceae. These plants are small, annual, free-floating, and generally form mats which may become quite dense, sometimes even restricting water flow.

Butomus umbellatus L. or "Flowering Rush" was received from both Flathead and Lake Counties. This perennial aquatic emergent plant is native to Eurasia, a member of the Flowering Rush Family or Butomaceae, and is becoming a problem along some of the developed shoreline of Flathead Lake where it apparently is growing too well. Before 1999, MONT Herbarium's only Montana record for this species (which can grow to over a meter in height) was a single collection from the north end of Flathead Lake (Flathead Co.) in 1962.



Butomus umbellatus, with enlargement of a flower.



Azolla mexicana, greatly enlarged.

[Plant illustrations *ex* Aquatic and Wetland Vascular Plants of the Northern Great Plains, 1993.]

Iberis umbellata L. or "Globe Candytuft", a (normally) cultivated ornamental annual mustard (Family Brassicaceae) native to Europe, was collected from a pasture in Park County (Livingston vicinity) and submitted for identification as a weed. According to information and vouchers at MONT Herbarium, this is probably the first record of this species naturalizing, or at least volunteering, in Montana.

Penstemon grandiflorus Nutt. or "Large-flowered Beardtongue", is a perennial member of the Figwort Family (Penstemonaceae) native to prairies of the Great Plains.

This species was collected near Zortman (Phillips County) and was likely planted as part of a reclamation seeding. Although this species has a distribution range including NE Wyoming, it was not known from Montana until submitted

for identification last July.

Scientific Illustration in New Book on Solitary Wasps
Cathy Seibert (MONT Herbarium Collection Manager) has published some of her scientific illustrations before (beetle wings in Mark Hooten M.S. thesis, 1991; spiders in MontGuide #9210, 1992 and revised 1995, 1997, 1999; click beetles in Catherine Seibert M.S. thesis, 1993; legume species (*Genistidium dumosum*) in Systematic Botany Monographs, Vol. 45, 1995; aquatic invertebrates in 4-H Leader Resource Guide #5272, 1997), but the recently available book **Solitary Wasps: Behavior and Natural History** by Kevin O'Neill (Cornell University Press, 2001) is her first work as an illustrator where she is featured on a book cover. She is also featured in the book's title piece.



Figure 4-1. *Argiocheilus acutella* female; [drawing by Catherine Seibert].

BOB'S BYTE Sharing resources with other computers - Bob Johnston



If you have multiple computers that have network connections it is very easy to share files or printers among these machines. If you do share resources you can save dollars by not having a printer attached to each computer or in the case of files, having multiple copies of files which may have different contents.

To share resources, the ability to do this must be turned on from the machine to which the printer is attached or from which files will be shared. To do this, **Right Click** on Network Neighborhood and select properties. Click on File and Print sharing and then click on the resources you wish to share. Close out of this screen and return to the properties screen. Click on the Identification tab and note your node name and which workgroup your computer is associated with.

To setup your printer to share - click on MY Computer and then click on Printers. Right click on the correct printer icon and select sharing. Assign a printer name and

password – Alphanumeric is best. If the sharing is setup correctly, a hand should show under the printer icon.

To access a printer being shared from another computer click on the printers icon again and select install printer. Select install network printer and then browse to the group where your computer is located (this will usually be either MSU or Plantscience). Find your computer name and click on it. The name you assigned to your printer should show up at this time. Select the printer and click on install. After installation, you will be asked for the password the first time you print. Make sure you tell your computer to save the password to avoid having to type it each time you print.

NOTE: If you authenticate through MSU with a NT client license using a user name and password (this will be mostly the office and administrative people) the procedure is a little different – See me for info.

Next month we will share files and folders between computers.

New Graduate Students

Thais (Tice) Hulting - Matt Lavin, 332 ABS



Erin Thais Hulting (most people call her Thais) received her undergraduate degree from the University of Illinois at Urbana, Champaign, otherwise known as the U of I (one of the U of I's in the Midwest not to be

confused with the University of Idaho, which causes mass confusion for those westerners living close to Idaho). Experiences over the past few years have ranged from collecting three body part insects, to working as an environmental educator, to living in the remote jungles of Ecuador where her first, and as of yet, most beautiful son was created. Returning to the U.S. full of excitement as well as hesitation eventually proved to be the right decision as she and her husband found their way to the enchanting and welcoming city of Bozeman.

Approximately one year after the birth of Aidan Grant, Thais has decided to pursue a Master's degree in Plant Sciences with Dr. Matt Lavin. Although feeling a little overwhelmed at first in the lab, she is working diligently and enjoys many conversations whether intellectual or otherwise with Matt and the other students. In her free time (needless to say it is a small amount) she enjoys playing the guitar, hiking with her black Labrador, and dealing with whatever adventures should pop up on any particular day.

Jason Walling - Norm Weeden, 233 ABS



I am a masters student studying molecular and cytogenetics under Dr. Norm Weeden. I grew up in Madison, WI, but received my undergraduate degree from the University of Minnesota-Twin Cities. The

title of my degree was "Science in Agriculture" with an emphasis on Molecular Biology and completed work for a minor in Environmental Horticulture. Outside the degree emphasis, the curriculum gave me the opportunity to explore the many aspects of plant science, from the applied sciences of cropping systems and agricultural practices, to plant physiology, pathology and genetics...and many things in between! During my undergraduate career, I also completed a senior thesis in which I worked with cultivars of Wild Rice using backcrossing and RFLP mapping to identify QTLs responsible for seed non-dormancy. My goal here at MSU is to try and attain as broad an education in the plant sciences as I can, furthering my pursuit to someday become a Plant Sciences instructor at either the upper high school or college level. To accomplish this I am doing a lab rotation through a few different labs in order to investigate different disciplines within the plant sciences. I am also pursuing a T.A. ship in the Molecular and Cellular Biology Labs in order to attain as much teaching experience as I can. Outside the academic realm I enjoy downhill skiing, backpacking, waterskiing, and (being a Wisconsin native) occasionally enjoy tipping back a few fermented beverages (only on weekends though Norm!).

Merritt Stinson - Barry Jacobsen, 130 ABS



Hello, My name is Merritt Stinson. I have lived in Bozeman for seven years now and graduated from MSU with an undergraduate degree in Biology. I plan to work with Dr. Zidack and Dr. Jacobsen during my

graduate studies. My goal is to gain a well rounded plant pathology background as well as to work with biocontrols. I would like to thank Dr. Mathre for his support and guidance in my undergraduate career. Without the opportunity to work in his lab I might not be here now.

New Employees

Dan McCarthy - Andreas Fischer, 238 ABS



I am Andreas Fischer's new lab technician. I graduated from MSU with a degree in Biotechnology. My main hobby in life is SCUBA diving. I am an instructor for SCUBA and currently the director for the SCUBA program on campus.

Maria Hernandez Jamirez - Dan Bergey, 338 ABS



Hello! My name is Maria Hernandez. I arrived in Bozeman last September and I am delighted to live in this gorgeous environment where I have met such a nice people.

I come from Granada (Andalucia, South of Spain).

Granada is known worldwide because of the "Alhambra" Palace, one of the finest examples of arabic architecture in Spain. Many artists including Garcia Lorca (poet) and Manuel de Falla (composer) were inspired by this magic town. In my village of Santa Fe, originally a military camp of the Catholic Kings, Christopher Columbus got funds for a trip from the Queen "Isabel la Catolica" in 1492. Later Santa Fe gave its name to many other cities in America. Six years ago, I left Granada to go to Madrid where I received my PhD in 1998. I worked on nitrogen fixation in legumes, specifically on oxidative metabolism during the senescence process of lupin root nodules. Later I moved to the University of Nice (France) for a postdoc where I carried out research on the regulation of glutathione and homoglutathione synthesis in *Medicago truncatula*.

I came to Bozeman because my husband received an offer to work in the interesting field of image reconstruction in the Math Department.

I feel very glad to have found a part time job in this Department with Dr. Bergey, who is providing me the opportunity to learn much about the exciting field of pathogenesis in tomato and serial analysis of gene expression. Hopefully, I will also work on pathogenesis in peas with Dr. Bergey in collaboration with Dr. Weeden.

I very much appreciate your welcome and I hope to meet all of you.

Susie begins new position with MONTS

The Montana NSF-EPSCoR program is excited and pleased



to announce the addition of Susie Couch to the staff. Susie, as you know, has worked with Plant Sciences and Plant Path for the past few years in the student affairs position.

Susie first came to MSU as an undergraduate studying Elementary Education. After many of life's experiences she began working at MSU in the Controller's Office, then moved to the Business Office and even worked for the University Police Department for a time.

She will begin her transition to the NSF-EPSCoR program on February 1st working in the office from 8 until Noon. She will then continue to be on the PSPP staff each afternoon through the month of February to help with the departments transition. Susie will become the Program Manager for NSF-EPSCoR and will be making sure that we keep very close track of our budgets and expenditures in all of the many programs outlined as part of the new Infrastructure grant. She'll also be working with very diverse groups of people across campus, the state, and federally to promote and develop this program. We are very happy to have you on board Susie!

From Susie:

Usually the most difficult thing about leaving one job for a new one, is saying goodbye to the co-workers I've come to know. In this case, I won't be moving across town or even across campus – just across the street! Currently, Kirstin Golga and Traci Miyakawa will be assuming my duties in Leon Johnson Hall, and I'll be training them for the next few weeks. I'm looking forward to my new responsibilities and know that I will see all of you often (always at coffee on Fridays!)

Na Li Graduates

Na Li, graduate student in Mark Young's Lab will be completing her Master's degree this month and moving to the East Coast. She has lined up a position in a lab at the University of Massachusetts in Worcester, Massachusetts. She will be working with *C. elegans* to gain practical experience before returning to China. We wish her the best in her new endeavors. Good Luck Na Li!!!

1. Heat wok or 12-inch skillet over high heat. Add oil; rotate wok to coat side.
2. Add chicken, stir-fry 1 minute. Add cauliflower mixture; stir-fry about 4 minutes or until vegetables are crisp-tender and chicken is no longer pink in center. Stir in stir-fry sauce; cook and stir about 30 seconds or until hot.
3. Serve over rice. Sprinkle with cashews.

February Birthdays

Mike Sun	2
Maria Hernandez	3
Norm Weeden	12
Na Li	15
Phil Bruckner	17
Traci Miyakawa	19
Pam Border	23
Shirley Gerherdt	26
Worapong Jeerapun	27

Happy Birthday!

