



# What's Cooking!

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## TOP OF THE HEAP

Well, HAPPY NEW YEAR everyone. I know it is going to be a great one for composting and the Composting Association. First I would like to welcome our new Board members: Ann Bleinberger with the Maryland Environmental Service; John Bouwkamp of the University of Maryland; and Jeff Smith from Mountaire Farms. Rejoining us for new terms are Nancy Goggin and Helen Waite. We had to say good-bye to Tom Houska and Norris Matthews, both of whom contributed well during their tenure. Thank you, gentlemen, for your service.

If you missed the annual meeting (details inside), you missed a great one. Marc Tefteau and Helen Waite put together a top notch program with a dynamic and varied group of speakers. Our thanks the organizers and those who gave their time that day to present us with good useful information on compost and composting.

Last year we started out by renaming ourselves and reaching out to neighboring states to form a larger, stronger Association. Maryland took us up on it and joined Delaware in the Composting Association of Del-Mar-Va. The year ended with the new Board of Directors meeting with contingents from Virginia and Pennsylvania. We agreed at that meeting to explore ways for the state organizations to work together. The Board decided at that meeting to formally incorporate a non-profit entity. This new entity will formalize our Association and it will also have the flexibility to serve as a regional association in the future. The name we chose was the "Mid-Atlantic Composting Association".

So, when you get your membership application for MACA-know that it is from us. A lot of volunteers give of their time to participate in educational efforts to promote compost and composting. Please show your support by signing up and paying for membership. We want to list all our members on the website; additionally if your company has a website you would like linked to ours, please contact Marc Tefteau.

The Maryland contingent has stepped forward to fill some valuable roles. Marc Tefteau has taken over as information manager for the web site and Herb Brodie has succeeded Steve Rohm as newsletter editor. Special thanks to Steve for his dedication in getting both the newsletter and website moving in the right direction. I would also like to thank Ann Bleinberger for heading the membership committee and spearheading a new member drive.

Spring is right around the corner; so remember.....

Make Compost the First Amendment to Your Soil's Constitution.

Sincerely yours,

*C. Patrick Condon*



The Composting Association of Delmarva  
will soon change our name to

**The Mid-Atlantic Composting Association**

Please watch for more information on our website:  
< [www.delmarvacompost.org](http://www.delmarvacompost.org) >

## WHAT'S IN A NEWSLETTER?

Every newsletter has a purpose aside from giving the editor and contributing authors something to do in their extra time. The purpose of this newsletter is to provide you as Association members with useful information. But, what is that information? What do you want to read in your newsletter? This issue contains some reports on member experience at meetings, educational and research activities plus some information sources and a short lesson about compost. Is that the right stuff?

Send any comment and, even better, send future articles to me by e-mail to <[hlbrodie@bluecrab.org](mailto:hlbrodie@bluecrab.org)>

## 9TH ANNUAL BETTER COMPOSTING SCHOOL

Once again, a successful Better Composting School was held at the end of October. Thirty participants from seven states participated in the three day school.

The course covered basic information for compost facility operators and included compost math, biology, feedstocks, process management, product quality and other pertinent issues. A field trip provided opportunity to "see it like it is" on five different types of compost facilities. The instructors were Herb Brodie, Lew Carr, Frank Gouin, Pat Millner and Marc Tefteau. These folks represent more than 70 years of combined compost research and practical experience.

The 10th Annual Better Composting School is scheduled for October 24, 25 and 26, 2001. Mark your calendar and watch our web site for updated information.



*Lab Exercise at the Better Composting School*

## COMPOST 2000 DOWN UNDER

Herb Brodie and Lew Carr made presentations at the Compost 2000 conference held at Melbourne, Australia in November. Lew talked about composting for disposal of poultry mortality. Herb described a long term procedure for composting land clearing residuals without size reduction that is used by FRP, Inc. in Howard county Maryland. Both papers were well received. Other topics discussed during the three day conference included compost technologies, economics of composting and compost utilization and regulation. Australia has all the same problems that we face in the MidAtlantic with regard to compost.

Because it took so long to get there (30+ hours door to door one way with 20 of that on an airplane), Herb spent a couple of weeks touring the country. Well it's a big place (the size of the U.S.) and you can't visit everything. The variety of things to see and do is almost endless and ranges from desert to tropical forest to rural farmland to cosmopolitan city. Most of the people live along the seacoast. Drive on the left and in Melbourne only make right turns from the left shoulder lane (think about it, even Australians have trouble with that one). The people are very friendly and helpful. We will be looking for any opportunity to return and explore some more.

## INFORMATION FROM INTERNET

The Internet has multitudes of compost related sites and we will try to list a few in each newsletter.

A list of downloadable fact sheets and reports on compost and compost use are available from the Clean Washington Center. Check out the range of titles at their web site <<http://www.cwc.org/>>.

At another Seattle site, <<http://www.ci.seattle.wa.us/util/rescons>> you can find a bunch of compost, recycling and conservation publications and activities. One is titled Ecologically Sound Lawn Care for the Pacific Northwest and contains sections on compost use on lawns that could be adapted to the East.

The United States Composting Council <<http://www.USCC.org>> lists experts, companies, publications and has a discussion group for compost questions and comments (they would like you to be a member to ask a question but anyone can read the messages).

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## COMPOSTING IN THE SOUTHEAST

by Pat Condon and Helen Waite

Y2Komposting was the title of the Composting Conference held in Charlottesville, Virginia last October. The Conference was sponsored by VPI, Virginia Cooperative Extension, and the University of Georgia. Dr. Greg Evanylo chaired this event with much help from his planning committee, headed by Craig Coker. The theme of the conference and trade show was that composting is about to enter a new phase as we enter the new millennium. The conference was designed to present some of these new tools for composting and compost utilization.

Presentations that caught our attention were: Ron Alexander's "The North Carolina Compost Promotional Initiative". North Carolina has set up a grant and assistance program to encourage development of a strong compost industry. A model for Delaware and Maryland you might ask?

"Erosion Control and Environmental Uses for Compost" was an excellent piece of work presented by Rod Tyler. Good documentation demonstrated valuable use of compost in steep bank stabilization, and compost berms as sediment control in lieu of silt fences.

Dr. Rosalie Green documented some startling growth patterns in her presentation "Effects of Composted Organic Materials on the Growth Factors for Hardwood and Softwood Tree Seedlings".

"Recycling and Biomass Energy" was a lively and humorous tongue-in-cheek presentation by Dr. George Garland that pointed out the folly of the Federal Government's misguided attempts to encourage burning of organics as alternative fuel. Compost instead! Also of particular interest was Dr. Larry Sikora's presentation "Lime-Stabilized Soil for Use as a Compost Pad". The USDA compost research facility in Beltsville has experienced great results with this fairly inexpensive approach. So much so that Dr. Sikora lamented that sometimes people are more interested in the pad than in the research.

There were many other good presentations, some of which ran concurrently, so we were not able to attend all. The conference subjects include: the state of composting; compost technologies; compost use in cotton, Christmas trees, evergreens, horticultural crops, greenhouses, roadside vegetation and erosion control; compost application methods and equipment; process odor control; food waste composting; composter education; compost pad construction; biomass energy; and large scale vermicomposting. A copy of the full Proceedings, it is available free on-line from [www.p2pays.org/main/http2.asp](http://www.p2pays.org/main/http2.asp).

The trade show segment of the conference was well supported by a variety of vendors who reflected aspects of the presentations.

All in all a very good conference. Good work Greg. Thanks.

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## TECH NOTE

Converting organic matter to compost is a process of growing microorganisms. Composters are in a sense farmers just like those folks that grow corn or cows. And, just like corn and cows, compost microorganisms need water, oxygen, nutrients and energy sources to survive and multiply. As with all living things, microorganisms are most efficient or most prolific when provided an optimum balance of the needed life giving substances. The definition of recipes of mixtures of organic products for composting centers around attempting to provide adequate amounts of carbon available for energy balanced with nitrogen (and other elements) available for nutrient combined with adequate moisture and mix porosity (for air exchange). Note that carbon and nitrogen must be available for the microorganisms. Those elements that might be tied in stable chemical forms or that might be inside very large particles may not be readily available and may not participate in the compost process in the time span we dictate. For example, large wood chips used to provide bulking (porosity) in a compost mix will not be readily degraded so the carbon content of the chips should not be considered as available and should not enter into the calculation of a carbon budget when we want to produce compost in two months time. On the other hand, the chips, and whole trees for that matter, will eventually compost as the carbon becomes available. It is just that it cannot happen in the short processing time we generally expect at most compost production facilities.

## POINSETTIA RESEARCH AT THE UNIVERSITY OF MARYLAND

by John Bouwkamp

Over the last 5 years, we have been studying the use of composts from various sources as an ingredient in potting substrates (a.k.a. potting soils). Every year we grow a fall crop of poinsettias and a spring crop of chrysanthemums and bedding plants (6-20 species). We have found that well made, well composted composts give fairly similar and usually satisfactory results. We have also noted that we can use more compost in the formulation when we include compost from 2 sources (i.e. poultry litter and biosolids compost).

The relative proportions (1:2, 1:1 or 2:1) seem to make little difference. With the 2-compost blends, we can use 2/3 compost, 1/6 peat and 1/6 perlite with poinsettias and achieve results similar to commercially available substrates. Likewise, we can use 1/2 compost, 1/4 peat and 1/4 perlite on bedding plants and 3/4 compost, 1/8 peat and 1/8 perlite on chrysanthemums. Since the nutrients in the compost containing substrates continue to mineralize, fertilizer rates can be reduced somewhat in poinsettias and mums. We are still working on the rates and analyses.



## USCC 10TH ANNUAL CONFERENCE

by Ann Bleinberger

The U.S. Composting Council (USCC) held their 10th annual conference last November in Cleveland, Ohio. It was three days of hands-on practical information on a variety of subjects relating to the compost industry. Of particular interest to me were the 4 sessions on marketing. Other subjects covered health and safety, odor and regulatory issues, contracting and operations, labeling, product testing and management issues. Facility tours were conducted during the first day of the conference. The Medina Class 1 Composting Facility which processes 500+ ton per day of mixed waste utilizing outdoor windrow technology was the first on the tour. Next was the City of North Royalton's Composting Facility, which processes 80 WTD of biosolids and yardwaste in an enclosed system. And last but not least was the Akron Compost Facility which processes 16,000 dry tons of biosolids per year, in one of the largest enclosed biosolids facilities in the country.

During the conference, the USCC elected new Officers as well as Board of Directors. The new officers for 2001 are Stuart Buckner from Islip, NY as president, Jack Hoeck with Rexius Forest Products from Eugene, OR as vice-president, Matt Cotton with Integrated Waste Management Consulting from Nevada City, CA as Secretary and Kevin Tritz with Specialized Environmental Technologies from Bloomington, MN as Treasurer. The Board of Directors carries 15 members from all over the country.

One hot topic on the marketing side was the use of compost filter berms and blankets for erosion control and slope stabilization. Field trials and research have proven this technology highly effective physically, environmentally and financially. In fact, filter berms and blankets have been shown to be much more effective than traditional silt fence at a lower cost. After most construction jobs using silt fences are completed, the fencing and the supports must be removed and landfilled. One of the many advantages to using compost filter berms that it stays on site and is incorporated into the soil during final grading improving the existing soil. No disposal costs are involved and no landfill space is consumed. Filter berms and blankets have been successfully used in California, Maine and Texas, primarily on highway projects.

The Maryland Environmental Service is currently testing this erosion control method at a waterfront property in Annapolis, MD with a by-product from the Dickerson Yardwaste Composting Facility. Another project is in the works with State Highway Administration. This has the potential of being a tremendous new market for local compost producers.

## PERDUE USES COMPOST

by *Bill Page*

In November, New Earth Services, Inc. delivered 300 cubic yards of chicken litter compost to the Perdue AgriRecycle Micronutrient Plant currently being constructed near Seaford, Delaware. Working in partnership with the Delaware Department of Natural Resources and Environmental Control (DNREC), the Springfield, Missouri based Perdue wished to make the yet- to-be operational plant more environmentally friendly. This facility will convert raw litter into pelletized form that will be sold for agricultural use.

DNREC provided funding for this project for several important reasons which included improving water quality by reducing erosion, controlling runoff, limiting the amount of airborne particulate from leaving the site and increasing wildlife habitat. Berms were constructed on the south and eastern boundaries of the facility and a chicken litter based compost was incorporated into the soil mix. The berms will then be planted with native plant material.

This will not only provide an aesthetically pleasing landscape that shields the site from passing traffic but was a great opportunity to demonstrate the use of compost.



*Perdue AgriRecycle Plant Site*



*Applying Compost at the Plant Site*

## MORE THAN 2,000 STUDENTS CONTACTED

The New Castle County Master Gardeners Schools Committee reports that they provided garden and compost information and activities to more than 2,000 young people in schools, day care, 4-H camp and other organized meetings in Delaware last year. The committee awarded 4 grants totaling \$1,250 to support gardening and compost programs for students. The development of a gardening and compost appreciation in young people is an important activity that broadens their view of nature.

Such activities are also important for the compost industry because many of these children will carry this appreciation into adulthood to become makers and users of compost. With the growth of the Delaware Composting Association into the DelMarVa Composting Association and now into the Mid Atlantic Composting Association, efforts need to be put forth to identify and combine State resources so that youth activities can be enhanced across the region.

For more information contact Hetty Francke.

## HELP WITH HORSE MANURE

The city of Seattle, Washington maintains a directory of urban horse owners who are willing to give or sell and possibly deliver horse manure to urban gardeners. Gardeners and home composters who want horse manure can then easily find a local source.

This activity provides a needed compost ingredient resource for the gardeners while alleviating a potential manure disposal problem for the horse owners.....sounds like something that we could be promoting.



*The Composting Association of Delmarva  
advocates market development  
to support composting and  
environmental quality on Delmarva.*

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View upcoming events on our website  
< [www.delmarvacompost.org](http://www.delmarvacompost.org) >



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